

NASA Technical Memorandum 104806 Vol. 1



# Documentation and Archiving of the Space Shuttle Wind Tunnel Test Data Base

## Volume 1: Background and Description

Paul O. Romere  
Steve Wesley Brown

(NASA-TM-104806-Vol-1)  
DOCUMENTATION AND ARCHIVING OF THE  
SPACE SHUTTLE WIND TUNNEL TEST DATA  
BASE. VOLUME 1: BACKGROUND AND  
DESCRIPTION (NASA. Johnson Space  
Center) 191 p

N95-19237

Unclas

G3/18 0037967

January 1995





# **Documentation and Archiving of the Space Shuttle Wind Tunnel Test Data Base**

## **Volume 1: Background and Description**

**Paul O. Romere**

*Lyndon B. Johnson Space Center  
Houston, Texas*

**Steve Wesley Brown**

*Lockheed Engineering and Sciences Co.  
Houston, Texas*

**January 1995**

This publication is available from the NASA Center for Aerospace Information, 800 Elkridge Landing Road, Linthicum Heights, MD 21090-2934, (301) 621-0390.



# VOLUME 1

## CONTENTS

	PAGE
ABSTRACT	v
NOMENCLATURE	vii
INTRODUCTION	1
CONFIGURATION DEVELOPMENT	2
WIND TUNNEL TEST PROGRAM	5
HISTORY OF DATAMAN	13
DATA BASE DESCRIPTION AND USAGE	14
CONCLUDING REMARKS	17
REFERENCES	18

### FIGURES

Figure 1 - Space Shuttle Phase B final configurations.	19
Figure 2 - Orbiter Vehicle dimensions; configuration evolution.	21
Figure 3 - Integrated Vehicle dimensions; configuration evolution.	26
Figure 4 - STS-1 mission configurations.	31

### TABLES

Table 1. Sample of Data Set/Run Number Collation Summary.	33
Table 2. Phase A/B Space Shuttle Vehicle Wind Tunnel Testing DATAMAN Digital Data Base Files Listing.	34
Table 3. Phase C/D Space Shuttle Vehicle Wind Tunnel Testing DATAMAN Digital Data Base Files Listing.	41
Table 4. Space Shuttle Wind Tunnel Test Program Data Report Documentation for Phase A/B.	61
Table 5. Space Shuttle Wind Tunnel Test Program Data Report Documentation for Phase C/D.	97



## **ABSTRACT**

The decision to design and develop a new Space Transportation System such that the vehicle would fly as both a spacecraft and an aircraft necessitated an extensive wind tunnel test program and the cooperation of all the major wind tunnels in the United States. The result was the largest such program ever undertaken by this country with approximately 100,000 hours of Space Shuttle wind tunnel testing conducted for aerodynamics, heat transfer, and structural dynamics.

In most past programs, wind tunnel test results have often been lost or inadequately documented for future use. The results of the Space Shuttle wind tunnel testing were converted into a Chrysler DATAMAN format to facilitate its use by the analysts. This resulted in a very cost effective method of collecting the wind tunnel test results, from many test facilities utilized, into one centralized location. Chrysler also documented each wind tunnel test as a DATAMAN report.

This report addresses the requirement to identify and provide a final documentation of the Space Shuttle wind tunnel program and to archive the available electronic digital data base, as compiled by the Chrysler DATAMAN system. Both the DATAMAN wind tunnel test reports and the associated wind tunnel test digital data base have been permanently archived at the NASA Johnson Space Center. The digital data base has also been distributed to NASA's Ames Research Center, Langley Research Center, and Marshall Space Flight Center, and to Rockwell International, the Space Shuttle prime contractor, to facilitate access to the data base by the analysts.

The Space Shuttle wind tunnel test data base was archived using UNIX based work stations and was saved in an ASCII format on an 8 mm cartridge tape. To facilitate the use of the digital data base tape, a user's manual has been developed and is presented as Volume 2 of this report. Example commands for accessing the tape and the format descriptions for the data files are presented.



## NOMENCLATURE

### Acronyms

A	Aerodynamic - test type designator or Ames Research Center - test responsibility designator
AADS	Ascent Air Data System
ABPS	Air Breathing Propulsion System
ADDB	Aerodynamic Design Data Book
AEDC	Arnold Engineering Development Center
AFFTC	Air Force Flight Test Center
AFRSI	Advanced Fibrous Reusable Surface Insulation
ALT	Approach and Landing Test
ARC	NASA Ames Research Center
ATP	Authority To Proceed
A.T.P.	Authority To Proceed
C	Carrier - test configuration designator
CA	Axial force coefficient
CAL	Cornell Aeronautical Laboratory
CAM	Carrier Aircraft Modification
CANCEL	Denotes test or publication was canceled.
CASI	Center for AeroSpace Information
CBL	Rolling moment coefficient
CDR	Critical Design Review
CFHT	Continuous Flow Hypersonic Tunnel
CLM	Pitching moment coefficient
CN	Normal force coefficient
CP	Pressure coefficient
CR	Contractor Report
CY	Side force coefficient
CYN	Yawing moment coefficient
DATAMAN	Data Management System (Chrysler Corporation)
DFI	Development Flight Instrumentation
DFRC	Dryden Flight Research Center
DOD	Department of Defense
ET	External Tank
F	Marshall Space Flight Center - test responsibility designator or Force file designator
FCS	Flight Control System
FRSI	Felt Reusable Surface Insulation (blanket)
GAC	Grumman Aerospace Corporation
GD	General Dynamics
GD/C	General Dynamics/Convair

GDC	General Dynamics/Convair
GN&C	Guidance, Navigation, and Control
H	Heating - test type designator
href	Heat transfer coefficient for one-foot radius sphere
h/href	Heat transfer coefficient ratio
H/O	Hydrogen/Oxygen
HCR	High Cross Range
HRSI	High (temperature) Reusable Surface Insulation
HSWT	Hypersonic Supersonic Wind Tunnel
HWT	Hypersonic Wind Tunnel
I	Integrated Vehicle - test configuration designator
ILRV	Integrated Launch Reentry Vehicle
IV	Integrated Vehicle
JPL	Jet Propulsion Laboratory
JSC	NASA Johnson Space Center
L	Langley Research Center - test responsibility designator
LaRC	NASA Langley Research Center
L/D	Lift-to-drag ratio
LCR	Low Cross Range
L.E.	Leading Edge
LeRC	Lewis Research Center
LMSC	Lockheed Missiles and Space Corporation
LOX	Liquid Oxygen
LRSI	Low (temperature) Reusable Surface Insulation
LTV	Ling-Temco-Vought Corporation
M	Mach or
	Manned Spacecraft Center - test responsibility designator
MAC	McDonnell Aircraft Company
M.A.C.	Mean Aerodynamic Chord
MCDAC	McDonnell Douglas Aircraft Company
MCR	Master Change Record
MDAC	McDonnell Douglas Astronautics Company
MDC	McDonnell Douglas Company
MMC	Martin Marietta Corporation
MSC	Manned Spacecraft Center
MSFC	Marshall Space Flight Center
NA	Not Applicable
NAAL	North American Aerodynamic Laboratory
NAR	North American Rockwell
NARC	North American Rockwell Corporation
NASA	National Aeronautics and Space Administration
NR	North American Rockwell
NR/GD	North American Rockwell/General Dynamics
NRLAD	North American Rockwell Corp., Los Angeles Division
NSRDC	Naval Ship Research and Development Center

NSWC	Naval Surface Weapons Center
O	Orbiter - test configuration designation
O/ET	Orbiter/External Tank mated configuration
OFT	Orbital Flight Test
OML	Outer Mold Line
OMS	Orbital Maneuvering Subsystem
OTS	Orbiter, Tank , Solid rocket booster
OV	Orbital Vehicle
P	Pressure file designator
PDR	Preliminary Design Review
PRR	Preliminary Requirements Review (management milestone)
PWT	Propulsion Wind Tunnel
RCS	Reaction Control System
RI	Rockwell International
RSI	Reusable Surface Insulation
RT	Reference Trajectory
RTLS	Return To Launch Site (abort)
S	Solid rocket booster - test configuration designator or Structural - test type designator
SCA	Shuttle Carrier Aircraft
SRB	Solid Rocket Booster
SRM	Solid Rocket Motor
SRR	Systems Requirements Review
SS	Space Shuttle
SSME	Space Shuttle Main Engine
SSV	Space Shuttle Vehicle
STS	Space Transportation System
SWT	Supersonic Wind Tunnel
T	External Tank - test configuration designator
TAM	Texas A&M
TBC	The Boeing Company
T.E.	Trailing Edge
TM-X	NASA Technical Memorandum
TN D-	NASA Technical Note
TPS	Thermal Protection System
TPT	Transonic Pressure Tunnel
TWT	Transonic Wind Tunnel
UNPUB	Unpublished
UPWT	Unitary Plan Wind Tunnel
USAF	United States Air Force
UW	University of Washington
UWAL	University of Washington Aeronautical Laboratory
V/STOL	Vertical/Short Take Off and Landing
VKF	Von Karman Facility
VSD	Vought Space Division

X	Orbiter longitudinal axis body coordinate
Y	Orbiter lateral axis body coordinate
Z	Orbiter vertical axis body coordinate

## SYMBOLS

cm	Centimeters
DIA	Diameter
ft	Feet, foot
g	Grams
GRADS	The hundredth of a right angle in the centesimal system
IN	Inches
K	Signifies unit of 1,000
LB	Pounds
m	Meters
mm	Millimeters

## SUPERSCRIPTS

o	Degrees
2	Square



## INTRODUCTION

This report addresses the need to provide a final documentation of the Space Shuttle wind tunnel test program and archive the available electronic digital data base. This report provides the final record of all applicable aerothermodynamic data collected, processed, or summarized during Phases A/B and Phases C/D of the Space Shuttle program. Reference 1 is a summary report of the Phase A/B testing and documentation. Reference 2 summarizes the Phase C/D testing and documentation up to November 1984. This report incorporates the material in references 1 and 2 and documents the testing and DATAMAN publications up through May 1994. Most important, this report identifies the available digital data base for all phases of the Space Shuttle wind tunnel program.

A traditional phased approach was used in the programmatic design evolution of the Space Shuttle configuration. The concept evaluation phase (Phase A) contractual studies were conducted in 1969. The concept definition phase (Phase B) extended over approximately two years, beginning in mid 1970. The research and development phase (Phase C) and the production and flight test phase (Phase D) began in August 1972, with the selection of Rockwell International as prime contractor and their being given the Authority To Proceed (ATP). The development of the Space Shuttle required an extensive wind tunnel test program and the cooperation of all the major wind tunnels in the United States. The Space Shuttle effort was the largest such program ever undertaken by this country. Approximately 100,000 total hours of wind tunnel testing was conducted for aerodynamics, heat transfer, and structural dynamics. The program was approximately four times the tunnel occupancy hours of the extensive Saturn V wind tunnel program. The Space Shuttle wind tunnel testing was directed by the NASA centers and was coordinated with National Aeronautics and Space Administration (NASA) management at the Johnson Space Center (JSC).

In most past programs, wind tunnel test results have often been lost or inadequately documented for future use. The authors feel that the extensive Space Shuttle wind tunnel test program should be considered as a national resource. It is with that thought in mind that the entire Space Shuttle wind tunnel test data base has been archived in both Chrysler DATAMAN and NASA reports and as a digital data base. This archiving has been accomplished with the goal of making the data base available and easily accessible. Often, advanced launch and entry vehicle studies focus on many of the configuration approaches considered during the original Space Shuttle studies. Availability of wind tunnel data for configurations similar to those being evaluated can prove to be highly valuable to the preliminary design engineer.

## CONFIGURATION DEVELOPMENT

The Space Transportation System (STS) was initiated with the Phase A conceptual design contracts in 1969. These contracts studied various methods of producing a completely reusable spacecraft system capable of a runway landing. The results of the Phase A studies led to the selection of a two-stage, completely reusable vehicle as the focus for Phase B contractual studies. The majority of the studies addressed a first stage manned "flyback" booster in combination with an Orbiter second stage. Subsequent to staging, the flyback booster utilized air breathing engines to return to the launch site for a runway landing. The Orbiter would continue the launch phase until low earth orbit was achieved. Following a typical on-orbit mission of 5 to 7 days, the Orbiter would enter the Earth's atmosphere at a high angle of attack (up to 60 deg.), ultimately landing on a runway much like a conventional airplane.

Midway through Phase B, estimates of system development costs indicated that the peak yearly funding requirements for the parallel development of the two manned, fully reusable vehicles would not be a viable programmatic approach. During this time, the second stage fuel tanks were removed from the Orbiter to minimize the impact of any Orbiter weight growth during program development. During the final months of Phase B, a parallel-burn concept was selected. This concept consisted of the simultaneous burn of both the solid rocket boosters (SRB) and the three liquid fueled Space Shuttle main engines (SSME). The two SRBs assisted lift-off and the initial ascent flight. The SSMEs, fed by an expendable external tank (ET), continued to burn until near orbital insertion. The orbital maneuvering system (OMS) engines provided the additional delta-velocity required for orbital insertion. The four Phase B contractor's configuration results are shown in figure 1. Phases C & D were begun in August of 1972 with the selection of Rockwell International as the prime contractor. Figures 2 and 3 present three-view drawings of the major Orbiter Vehicle (OV) and Integrated Vehicle (IV) definitions at the ATP, preliminary requirements review (PRR), preliminary design review (PDR), critical design review (CDR), and major configuration definitions of Vehicles 2A, 3, 4, 5, and 6. The OV102 and IV for STS-1 are illustrated in figure 4.

In addition to defining the concept for the Phases C & D contract, Phase B studies resulted in several programmatic decisions which significantly influenced the aerodynamic design of the Space Shuttle Orbiter. The most significant Phase B decision was the selection of the reusable surface insulation (RSI) system rather than a hot-structure system for protection from entry heating. This RSI design dictated that the initial entry angle of attack should be as high as possible (30 to 50 degrees) to minimize re-entry heating. The United States Air Force requirement of a 1100-nautical mile (2037-kilometer) crossrange dictated that the angle of attack be 30 degrees or lower in order to achieve the required hypersonic L/D. To reduce re-entry heating, thereby increasing lifetime of the RSI, a profile of 40 degrees was chosen for those missions not requiring the high crossrange.

Another Phase B decision affecting the future aerodynamic design was to provide for a completely computer-controlled, automated entry. This permitted the design of an entry flight control system (FCS) to artificially provide the required vehicle stability and the proper

handling qualities. Traditionally, a relatively large empennage is required to provide the requisite vehicle directional stability. However, augmentation of the aerodynamic stability through the FCS permits the design of a smaller empennage, thus providing a significant reduction in vehicle weight.

Initially in Phase B there was not a design landing velocity on which to size the wing, the major weight driver of the Orbiter. As a consequence, it was difficult to make relative weight comparisons among the various contractor designs. Midway through the Phase B effort, NASA defined a subsonic design velocity that was to be used to size the Orbiter wing. This design velocity, later referred to as the design landing velocity, was defined as the trimmed velocity at an angle of attack equivalent to tail scrape angle at touchdown. A design velocity of 165 knots (306km/hr) was chosen since man-in-the-loop simulations indicated this velocity produced actual touchdown velocities of 180 to 190 knots (334 to 352 km/hr). Touchdown velocities of this magnitude were well within the state of the art in landing gear systems. This criterion was used throughout the remainder of the development program.

As an end item product for Phase B each contractor was required to estimate the amount of the Phases C & D wind tunnel testing that would be required for detail design and development. In reviewing these estimates, it became obvious that the aerodynamicist would be faced with properly analyzing, verifying, and documenting the largest wind tunnel development program ever undertaken. Proposals of the four contractors called for programs ranging from 27,000 to 50,000 hours. Using these contractor estimates, NASA established a total baseline wind tunnel program of 32,000 hours. The actual program ultimately accumulated approximately 20,000 hours for the phase A & B effort and approximately 80,000 hours for the phase C & D effort.

Although not directly related to the aerodynamic design, two program management decisions were made at the beginning of Phases C & D that significantly affected the magnitude of the challenge to the aerodynamicists. The first decision was to baseline the Orbiter systems configuration at the Authority to Proceed (ATP) milestone. Thereafter, the only design changes permitted were those which were required to fix critical system design problems. The Orbiter systems baseline included not only the vehicle outer mold line (OML) configuration, but guidance, navigation, and control (GN&C) systems and other subsystems. The second decision was to fly a manned, orbital mission on the initial flight of the Space Shuttle system. This philosophy of permitting only mandatory design changes significantly influenced the management of the aerodynamic and FCS development.

Late in 1973, a carrier vehicle concept was originated for ferry and air launch (low-speed flight test), replacing an original concept of "bolt-on" air-breathing engines. Operational limitations with range, turnaround time, and recovery from contingency bases coupled with technical concerns over Orbiter scar weight, thermal protection system (TPS) degradation, and possible cargo bay contamination necessitated the change. Further studies indicated the carrier concept was feasible for both ferry and the Approach and Landing Test (ALT) Program, leading to the selection of the Boeing 747 as the Shuttle carrier aircraft (SCA), in June 1974.

Strongly influenced by the economic and programmatic decisions previously discussed, three major aerodynamic challenges emerged. The first challenge was the aerodynamic design of a spacecraft/aircraft that could fly through the entire atmospheric flight regime. The design had to satisfy the conflicting requirements of a spacecraft-like re-entry and an aircraft-like runway landing. It was to be the first winged vehicle to fly through the hypersonic speed regime, providing the first real test of experimental and theoretical technology for high speed flight. No design precedents existed to help establish the design requirements of such a vehicle. Yet, the design had to satisfy the conflicting aerodynamic characteristics of the various flight regimes as well as satisfying the requirements of a completely automated, multi-mode flight control system. The second challenge was the preflight prediction of the aerodynamic characteristics of a complex vehicle with an accuracy consistent with establishing sufficient confidence to conduct the first orbital flight with a manned vehicle. This required the identification of the proper aerodynamic similarity parameters and overcoming the unknowns of the most extensive hypersonic wind tunnel program ever undertaken. Also, in order to ensure consistency of design, it required careful configuration management of a continuously evolving aerodynamic data base to ensure that at any one point in time all systems and subsystems were using the same set of aerodynamics.

Finally, the third challenge was the technical management of the aerodynamic subsystem, which consisted of the following elements:

- a. Integrating and focusing the efforts of a diverse number of organizations from the NASA, Department of Defense (DOD), and industry aerodynamic communities.
- b. Obtaining the support and ensuring the efficient utilization of virtually every major wind tunnel facility in the United States.
- c. Ensuring the proper and timely interface with the other Space Shuttle systems and subsystems.

## **WIND TUNNEL TEST PROGRAM**

### **Early Development**

Early in the Space Shuttle program, the decision was made that the first flight of the Space Shuttle would be a manned flight. However, the utilization of a typical graduated flight test program through the expected Mach number regimes was not feasible, or possible. This dictated that the wind tunnel test program be extremely thorough and highly efficient. Further complicating this goal was the fact that much of the expected flight Mach regime involved breaking new ground and very little empirical data were available for the early Space Shuttle studies. Testing had to be designed to produce reliable data, thus necessitating that each distinct configuration and test environment requirement in each discipline had to be justified. Those disciplines included aerodynamics, aerothermodynamics, airloads, structural analysis, and separation. To conserve costs, the major portion of the wind tunnel testing would be conducted in NASA facilities. While the prime contractor, Rockwell International, conducted the majority of the wind tunnel tests, Marshall Space Flight Center (MSFC) and Langley Research Center (LaRC) conducted major supporting test programs amounting to approximately 20,000 hours. MSFC, having a direct responsibility to the Space Shuttle program, performed approximately 7,000 hours of in-house Shuttle technology testing. JSC conducted approximately 1,800 hours of testing, primarily in direct support of Orbiter aerodynamics.

Early testing was directed towards the definition of basic vehicle characteristics and parametric effects. Much of the later data was utilized incrementally to estimate the characteristics of any proposed design modifications. Once the configuration design was "frozen," for management review purposes, the new design was then tested to verify the estimated data base. This process was repeated several times throughout the program with extensive verification testing held to a minimum until the end of the program and the "as-built" configuration was then tested.

### **Test Coding System**

The test code system for the Phase A/B test program was developed by the Marshall Space Flight Center. A list of test objectives was developed and assigned a number with prefaces of "S" for stability tests, "H" for heating tests, and "P" for pressure tests. Each wind tunnel test was assigned one or more objective numbers, depending upon the objectives accomplished by a particular test.

A test coding system was developed by the JSC for the Phase C/D test program management and coordination. Each test was given an alpha/numeric identification code. The test coding system was designed such that for Rockwell tests, the first of the two alpha characters indicated whether the tests were for the Orbiter (O), Integrated Vehicle (I), carrier aircraft (C), external tank (T), or solid rocket booster (S) configuration. The second alpha character represented the area of discipline to be evaluated: aerodynamics (A), heating (H), or structures (S). The numerical characters represented the chronological order of the tests. It should be noted that the airloads and the ascent phase separation aerodynamics are listed

under “A”. Structures tests are predominately structural dynamics tests. The heating test program included some pressure distribution testing that was done simultaneously (at the identical test conditions) with the heating tests to ensure data analysis compatibility.

For those support tests conducted by the various NASA centers, the first alpha character was changed from the above description and was used in identifying the center as LaRC (L), MSFC (F), ARC (A), and JSC (M). The remainder of the identification code was the same as previously explained.

### Integrated Vehicle

The integrated vehicle basic force and moment data were required early in the program. The requirement for both SRB and SSME power-on effects for the total vehicle stability was determined from that data base. Achieving total vehicle stability required that the aerodynamic and thrust forces and moments be in equilibrium. The aerodynamics would dictate SRB and SSME precant nozzle settings and engine gimbal requirements. Since plume effects have such a strong effect on stability, plume simulations were included in the early testing. Those tests involved the use of an aft sting position for both plume on and plume off testing. Later plume testing was run using a blade support, from the lower surface of the ET, to concentrate on measurements in the base region. This system provided a relatively “clean” base region for high quality measurement of base effects. Plumes were simulated using solid plumes and high pressure, unheated air. When duplication of the actual engine exhaust plumes was planned, compromises had to be made. It was neither technically nor economically feasible to completely duplicate the exhaust gas from the SRB’s and SSME’s for each of the launch configuration tests for the following reasons.

- a. The geometry could not be accurately simulated due to the necessary plumbing required to pass the simulant gases into the model.
- b. Providing a “clean” base area dictated the use of a blade support system mounted through the ET.
- c. Exhaust plume testing is an order of magnitude more expensive and time-consuming than “standard” aerodynamic testing.

Therefore, the approach used in the Space Shuttle test program was to use state-of-the-art techniques for the basic power-off data base. Then, power-on effect increments were generated from a limited number of exhaust plume tests, conducted to measure both base and forebody plume effects. Those tests covered the transonic and low supersonic region where the plume effects are most significant. It should be noted that during 1988, one test series, IA308A and IA308B, was conducted using hot gas simulations of both the SRB and the SSME plumes to better define the forebody plume effects. High Mach number data points were filled in with supplemental data from base heating tests. As a result, many tests served several purposes and generated data in several separate test disciplines. Pressure tests

(distributed loads tests) were accomplished in this manner, as were the extensive detailed testing to determine wing bending, torsion, and shear (as well as elevon-rudder hinge moments). These tests were generally done without plume simulations due to the complications of having the instrumentation and the plumbing for the pressurized air all in the same model. The resulting distributed loads data were integrated to obtain forces and moments that were compared to the test force and moments. These two independent sets of data were compared and balanced to be within 3 percent of one another.

Static force and moment data on the SRB's and Orbiter/ET (O/ET) configurations were determined at Mach 4.5 for nominal staging conditions. Testing was accomplished with both the separation motors simulated using high pressure air in conjunction with model nozzles scaled to reproduce jet-to-free-stream momentum ratio and with plumes off. An automated captive trajectory system was utilized to produce the relative motion between the SRB's and the O/ET. This system was programmed to sequentially vary the SRB relative positions according to a preprogrammed run matrix. To facilitate the use of the eight required independent variables (jet momentum ratio, O/ET pitch and yaw angles of attack, SRB relative longitudinal, vertical and lateral displacement, and SRB relative pitch and yaw orientation), a unique data organization strategy, the "hypercube" approach, was developed. This "hypercube" strategy, as opposed to the classical grid data format, resulted in the reduction of required test data points by two orders of magnitude.

Since the nominal ET separation procedure is accomplished at an altitude at which aerodynamic forces and moments are negligible as compared to the forces and moments due to the reaction control system (RCS) jets (used for the separation maneuver), no testing was done here. However, during the RTLS abort, the ET is separated from the Orbiter in a significant aerodynamic environment and the interaction of the RCS jets with the free-stream is substantial. For these flight conditions, testing was accomplished using the captive trajectory system much in the same manner as the SRB separation technique described above.

The ascent aerothermodynamic heating tests began in the last half of 1973 after the configuration had gone through most of the major changes. The bulk of the testing was accomplished using thermocouples in conjunction with thin-skinned models to measure rapid temperature changes. Pressure testing was generally done to the same test conditions to better define the local flow environment. Later testing concentrated on the base area to identify requirements for the base heat shield at high altitudes and measured pressures and heat transfer characteristics with simulated plumes. Supplementary testing was accomplished with flat plate models to duplicate areas that had configuration discontinuities, such as thermal protection system (TPS) tiles, and oil-flow techniques to identify flow patterns and regions of high pressure concentrations.

The ascent structural dynamic testing was concentrated around aeronoise (fluctuating pressure) testing in the critical transonic and low supersonic regions of flight. Testing was also performed to check the possibility of flutter initiation during transonic and low supersonic flight and to determine the effects of ground winds.

At around the mid-program point, the subsystem managers for aerodynamics, airloads, heating, and stage separation felt that air data measurements would be required for the ascent phase for postflight analyses. This resulted in the development of an ascent air data system (AADS). Testing of the AADS was done largely using a 7 percent forebody model with supplementary tests on complete scale models for Space Shuttle element effects.

### Orbiter Vehicle

The Shuttle Orbiter preflight entry aerodynamic data base was built on a foundation of approximately 27,000 hours of wind tunnel testing. Considerable effort was expended in assuring that the test program utilized state-of-the-art facilities. The wind tunnel test program was effectively divided into three phases, with the first addressing the configuration development. This phase covered the time period of ATP to Systems Requirements Review (SRR) and addressed ATP configuration refinement, evaluation of the PDR configuration, and definition of the CDR configuration. The prime contractor devoted the majority of their Phase II efforts to developing and verifying the aerodynamic characteristics for the ALT/carrier program, although initial development testing for the Orbital Flight Test (OFT) program was also performed. These latter development tests were directed toward establishing the basic stability and control characteristics across the Mach range; establishing control surface effectiveness and hinge moments; initial RCS testing, and viscous interaction testing. The FCS was converging on a detail design during the Phase II time period and concerns surfaced regarding the sensitivity of the FCS to nonlinear aerodynamics. In order to investigate potential nonlinearities, JSC management requested LaRC to supplement the contractors test program. These tests investigated the following areas: (1) non-linear aerodynamic characteristics of the basic vehicle and its control surfaces; (2) aerodynamic damping characteristics; (3) control surface interactions; and (4) high Mach/altitude simulations. In addition, the possibility of high altitude snap roll caused by asymmetric separation of the wing's leeside flow field was explored.

The final phase (Phase III) of the wind tunnel test program was initiated in early 1978 to verify the predicted aerodynamic characteristics of the final vehicle configuration prior to the first orbital flight (STS-1). The objectives of this phase were to (a) verify and/or update the aerodynamic characteristics of the final, "as-built" configuration across the Mach range of 0.2 to 15, (b) test fine-cut (small increments) in Mach number, angle of attack, angle of sideslip, and control surface position along the nominal flight trajectory, and (c) minimize model-to-model and tunnel-to-tunnel discrepancies. The final, preflight Aerodynamic Design Data Book (ADDB), reference 3, was primarily based on these verification tests. The verification phase consisted of three parts: (1) initially planned verification tests; (2) anomaly resolution tests; and (3) supersonic/hypersonic lateral-directional nonlinearity tests.

Two high-fidelity wind tunnel models, of 2% and 5% scale, were designed and constructed based upon the March 1976 OV-102 configuration drawings to ensure accurate modeling of all aerodynamic surfaces and simulation of all relevant cavities and protuberances. Although some minor changes to the TPS thicknesses were made after March 1976, these changes were



closely monitored to ensure that there were no aerodynamically significant differences between the wind tunnel models and the actual OV-102 flight vehicle.

Part 1 of the verification phase consisted of the wind tunnel tests required for verification as it was originally conceived. These tests covered the Mach range of 0.2 to 15 using the two high-fidelity models without planned duplication of test conditions involving different combinations of models and facilities. Several additional tests and considerable analyses were required to actually complete the preflight verification process. In order to acquire the highest quality data possible within time and fiscal constraints, a test team was established for each test consisting of the prime contractor, JSC, and facility engineers, co-chaired by the JSC and the prime contractor lead engineers. This team followed the test from initiation through model design and construction, test plan development, conduct of tests, and analysis of results.

The design of the verification tests drew heavily on experience and the results of a series of wind tunnel tests conducted by LaRC. The LaRC tests utilized a 1.5% scale model (OV-101/140C configuration) with remotely controlled elevons. They were conducted to investigate transonic and low supersonic lateral-directional nonlinearities and showed the importance of obtaining wind tunnel data in small increments and of utilizing remotely controlled aerodynamic surfaces. Two of the major benefits of testing with remotely controlled surfaces are: (1) permits efficient acquisition of small increments of the primary variable of interest, i.e., the control surface position; and (2) permits the acquisition of more accurate data by sweeping the control surface position while other test variables are held constant.

Although Part 1 of the verification tests was largely successful, initial analysis of the data from these tests indicated additional wind tunnel tests were required to resolve the following test anomalies:

- a. Transonic -- resolve blockage and shock reflection effects.
- b. Supersonic -- verify relatively large facility flow tare corrections at the Arnold Engineering Development Center (AEDC).

A quick-look analysis of the verification test addressing the transonic blockage/shock reflection and supersonic tare correction problems still did not provide any clear-cut solutions to the original problems. Therefore, in July 1978, the Technical Panel for Orbiter Aerodynamics was formed at the request of the JSC Center Director to address these problems. The objective of the Panel was to expedite the analysis of the Orbiter aerodynamic design data to produce a mature data base that would support the launch of the first manned orbital flight planned for March 1980. This Panel was composed of working-level aerodynamicists representing expertise from ARC, Dryden Flight Research Center (DFRC), LaRC, JSC, Air Force Flight Test Center (AFFTC), and the prime contractor. The major functions of the Panel were:

- a. Recommend and conduct wind tunnel tests.

- b. Evaluate and recommend the most valid test data for use in establishing the ADDB preflight predictions.
- c. Perform an independent, detailed analysis of critical areas.
- d. Perform a thorough review of the proposed ADDB prior to publication and make recommendations for acceptance or change.
- e. Obtain Panel consensus that the ADDB is the best representation of the Orbiter aerodynamics.

The results of a wind tunnel test conducted by LaRC to assess the OV-102 configuration showed that there were no significant aerodynamic differences between OV-101 and OV-102. As a result, the large number of wind tunnel tests LaRC had conducted using the 1.5% model (OV-101 configuration) was used in developing the final fairings for the preflight ADDB. The high fidelity OV-102 model data was still considered prime and was weighed the heaviest of all the data. The LaRC tests contributed significantly to filling in gaps of the OV-102 data base and to establishing model-to-model and tunnel-to-tunnel repeatability. The product of the Panel was the official Space Shuttle Orbiter ADDB published in October 1978 (Reference 3) and revised in April 1979 (Reference 4).

Prior to the formation of the Technical Panel, the technique of reviewing the correctness of the ADDB published by the prime contractor was to conduct a formal review after publication. Unless major discrepancies were identified and agreed to, no changes were usually made as a result of the formal review. Because the Panel worked closely with the prime contractor, making recommendations and changes during the development of the ADDB, a much more detailed review and refinement than by previous means of review were made possible. Almost all of the changes recommended by the Panel were accepted and implemented with minimum schedule impact. A significant amount of work by individual members was published directly in the ADDB.

After the Panel's work was complete, a minor update to the April '79 ADDB was made and the official aerodynamics data base was frozen in May 1980 to conduct final Guidance, Navigation and Control (GN&C) verification for STS-1. This data, the official preflight Orbiter aerodynamic data base, was published as a NASA Contractor Report in November 1980, and was designated as the STS-1 ADDB (Reference 5).

In January 1980, while conducting an in-house research test on high angle of attack aerodynamics, LaRC found a large difference in directional stability at Mach 6 from that predicted by the STS-1 ADDB. This gave rise to some potential FCS concerns about performing a bank reversal in flight near Mach 6. An investigation of this potential problem led to Part 3 of the verification test phase: Supersonic/hypersonic lateral-directional nonlinearity tests.

It was discovered that the lateral-directional characteristics are highly nonlinear with sideslip angle at certain angles of attack. Further, this phenomenon is not limited to Mach 6, but occurs over a Mach range of 2 to 8, at various angles of attack. Also, previously unobserved nonlinearities of the sideslip derivatives with Mach and speedbrake position were identified.

The basic problem was that in some cases, the sideslip derivatives are linear only over a range of 0.5 degrees of sideslip. The smallest increment previously tested was 1 degree and most data was at 2 degrees. The cause of these nonlinearities is thought to be a complex vortex interaction with the vertical tail/speedbrake.

Discovery of a problem of this magnitude so late in the Shuttle program development (projected launch date of STS-1 was just over 1 year from discovery of the problem) presented a schedule problem of how to acquire the necessary wind tunnel data, analyze the results, and put the data fairings in a format that was acceptable for input to the simulators so that a safety assessment could be performed prior to STS-1.

In order to resolve the aerodynamic/FCS anomaly in time to support STS-1, a team was formed consisting of JSC, the prime contractor, LaRC, and wind tunnel facility engineers. This included aerodynamicists, flight control engineers, and simulation engineers at JSC. As a result of this team's actions, a detailed analysis of the test data was performed on-site during each wind tunnel test such that by the end of the year, final fairings were complete and the data had been converted into a form ready for the flight simulators. The data was then evaluated on an engineering simulator at JSC. The results showed that the large nonlinearities with Beta could cause loss of control during a bank reversal when combined with certain FCS uncertainties such as winds and angle of sideslip errors. As a result, the trajectory of the first flight (STS-1) was changed to avoid a bank reversal near Mach 6.

These new wind tunnel data were then used to produce a major update in the STS-1 ADDB, published in April 1982 as the Pre-Operational ADDB, reference 6. The Pre-Operational ADDB, although published after STS-1, contained no flight data (except for limited ALT results) and represented the true best estimate of preflight aerodynamics for the Space Shuttle Orbiter. Subsequently, flight test data has been incorporated into the preflight aerodynamic data base and published as the Operational Aerodynamics Data Book, reference 7.

### Ferry/ALT Configuration

Much of the feasibility testing for the ferry/ALT launch configuration was performed by the carrier vehicle contractors (Boeing and Lockheed) before the selection of the Boeing 747 as the carrier aircraft. However, force and moment testing for detailed configuration development and verification of the mated vehicle, as well as the separation characteristics, were still needed. In addition, testing was required for the development of a low drag tailcone for the Orbiter. This tailcone was required to minimize the buffet disturbance to the carrier aircraft. The force and moment tests were performed in the same facilities the carrier aircraft contractors had utilized because of concerns over model compatibility and data comparability. The separation tests were done using a minimum matrix of conditions in conjunction with a computer graphics program that varied each vehicle's control settings (including spoilers, landing gear, etc.) to optimize on a safe separation procedure. Several exploratory tests were conducted to ensure the carrier aircraft vertical tail would be able to sustain any buffeting induced by the tailcone wake. It should be noted that during the testing required to define the optimum tailcone configuration (low drag, low wake), many sting and pylon support system

arrangements were utilized to minimize the model support effects on the tailcone region of the model.

## **HISTORY OF DATAMAN**

Simply collecting the wind tunnel data base was a major undertaking. The fruits of this undertaking would have been meaningless unless the results of those tests could be presented to the aerodynamic analyst in a digestible form. The Space Shuttle Program management turned to the computer to facilitate this process. Chrysler Corporation's Space Division devised and operated a system of computer programs called DATAMAN (Reference 8) to document and present test results to the aerodynamic analyst in a variety of plotted forms. The analyst could have at his disposal the data in the desired form allowing an efficient analysis to be performed. Chrysler received data tapes from the various facilities, transformed the various tapes to a common format, and used the computer program system to correlate, document, and produce data upon request to the aerodynamic analysts.

Chrysler initiated the DATAMAN project in early 1970 and continued through both the Phase B and Phase C/D test programs. Extensive management procedures were devised to effectively identify and track the large volumes of data generated by a number of contractors on a variety of configurations. The DATAMAN program provided a means of conveying the required descriptive information relative to the configurations and the associated test data.

The Chrysler DATAMAN system was a very cost effective method of collecting the Space Shuttle wind tunnel data from the various test facilities into one centralized location. Putting the wind tunnel data into a common format was a key benefit of the DATAMAN program and made it convenient and useful to the various NASA and contractor users of the data. Chrysler's achievements in providing wind tunnel data analysis documentation were essential to the orderly design and development of the Space Shuttle flight configurations. These achievements were recognized by the Johnson Space Center in the award of a Certificate of Appreciation.

The Chrysler DATAMAN contract with NASA JSC was terminated at the end of May 1993 due to funding considerations. The final months of the contract were devoted to transferring the massive amounts of digital wind tunnel data and documentation to the Johnson Space Center for permanent archiving.

## **DATA BASE DESCRIPTION AND USAGE**

A four digit report identifier was assigned as initial test inputs were made to the DATAMAN system to track and report activities on individual tests. For the Phase A/B test program, these identifiers were DMS-DR-1001 through DMS-DR-1278. Thus, approximately 278 sets of test results were processed, documented, and databased for Phase A/B. For the Phase C/D test program, these identifiers were DMS-DR-2001 through DMS-DR-2550. Approximately 550 sets of test results were processed, documented, and databased for Phase C/D.

The assignment of identifiers was sequential and they are, therefore, chronological throughout the various phases of the configuration management. Many other identifiers are associated with individual tests such as configuration type, NASA series numbers, test facility designations and contractors involved.

Most tests were documented in a DATAMAN test data report, and test data were archived in a standard DATAMAN format. The fundamental unit of the archived Space Shuttle wind tunnel data base is the data set. The individual wind tunnel tests are composed of multiple data sets. A data set is the collection of identifying information and the set of aerodynamic coefficients and related independent variables. The set of data related to the data set is, in wind tunnel terms, the collection of runs pertaining to a given configuration or set of model conditions. The run series is aggregated into one whole, identified as such and treated as a unit in the archived Space Shuttle wind tunnel digital data base.

The principal components of a data set are the identifying information, termed header block, and the aggregated data for the run series, the data block. The header block is composed of the following constituents:

- a file identifier
- a description of the data set
- the names of the independent and dependent variables contained in the data set

The data block contains:

- aerodynamic data coefficients
- corresponding independent variables (Mach, angle of attack)
- derived data

A data set can be in the form of static pressure (or thermocouple data) or force balance (six-degree of freedom) data. These are designated as pressure or force aerodynamic data sets. The designation of these data sets and their contents is primarily according to form rather than content. The actual contents of a data set are immaterial as long as the data are systematic variables of a set of independent variables or dimensions of the data set matrix. The typical independent variables (matrix dimensions) for a force data set are Mach and angle of attack. The typical dependent variables (matrix elements) for a force data set are CA, CN, CLM, CY, CYN, and CBL. The typical independent variables for a pressure data set are Mach, angle of

attack, X, Y, and Z. The typical pressure data set dependent variable is Center of Pressure (CP), whereas, h/href is utilized for thermocouple data.

Shown in Table 1 is an example of a data set/run number collation summary for a force data set. Note in the example, that for a particular data set, the runs at the different Mach numbers and for the same model and tunnel conditions have been gathered into the same data set.

The Space Shuttle Vehicle wind tunnel testing DATAMAN data base listings for Phases A/B and C/D are shown in Tables 2 and 3. The first column of the tables contains a Chrysler DATAMAN assigned report number for each of the wind tunnel tests. The second column contains the contractor report number (or other NASA report number) assigned by NASA to the DATAMAN report publication. Some of the Phase A/B tests did not have a NASA contractor report (CR) number assigned. This column may also contain CANCEL if the test or publication was canceled. If the test results were not published by Chrysler DATAMAN, the column will have the entry UNPUB. Also indicated in this column are the volume numbers for a publication, when applicable. Some of the tests conducted at the Langley Research Center, while assigned a Chrysler DATAMAN report number, were published by the Langley Research Center as Technical Memorandums (TM-X) or Technical Notes (TN D-) reports, as indicated in column 2. The third column contains the NASA series number assigned to each test. The explanation of the Phase A/B and Phase C/D NASA series test coding systems has been previously discussed under the Wind Tunnel Test Program section of this report.

The fourth column of Tables 2 and 3 contains the facility and name of the wind tunnel where the test was conducted. The fifth column contains the wind tunnel test number as assigned by the facility. Shown in the sixth column is the archive file name assigned by Chrysler DATAMAN. If the archive file name begins with the letter "F", the data available is force data. The letter "P", denotes pressure data. The last, or seventh, column contains a two character test code assigned to the test data by Chrysler DATAMAN. This two character code is unique for each test and is embedded in the second and third position of each data set name in the digital data base.

The Space Shuttle wind tunnel digital data base has been archived such that specific wind tunnel test files can be requested from the Aeroscience Branch of the Aerosciences and Flight Mechanics Division at the Johnson Space Center. This information is also available from the Aerothermodynamics Branch of the Gas Dynamics Division at the Langley Research Center, the Experimental Fluid Dynamics Branch of the Fluid Dynamics Division at the Marshall Space Flight Center, the Applied Aerodynamics Branch of the Aerodynamics Division at the Ames Research Center, and from the Space Shuttle prime contractor, the Aerodynamics Department of the Space Division at Rockwell International at Downey, California. A User's Guide (Reference 9) details the process of accessing the digital data base archive tape. To further assist the user in determining which data may best suit his needs, each of these data repositories possesses a complete set of the DATAMAN collation sheets, or run schedules, for each the individual wind tunnel tests. Once the user has determined which set or sets of

wind tunnel data is needed, the request for a copy of that data should be made to one of the data repositories.

Tables 4 and 5 present the lists of the publication titles for all Chrysler DATAMAN reports for Phase A/B and Phase C/D, respectively, of the Space Shuttle wind tunnel tests. These documents are available through the Center for AeroSpace Information (CASI). The telephone number for CASI is (301) 621-0390.



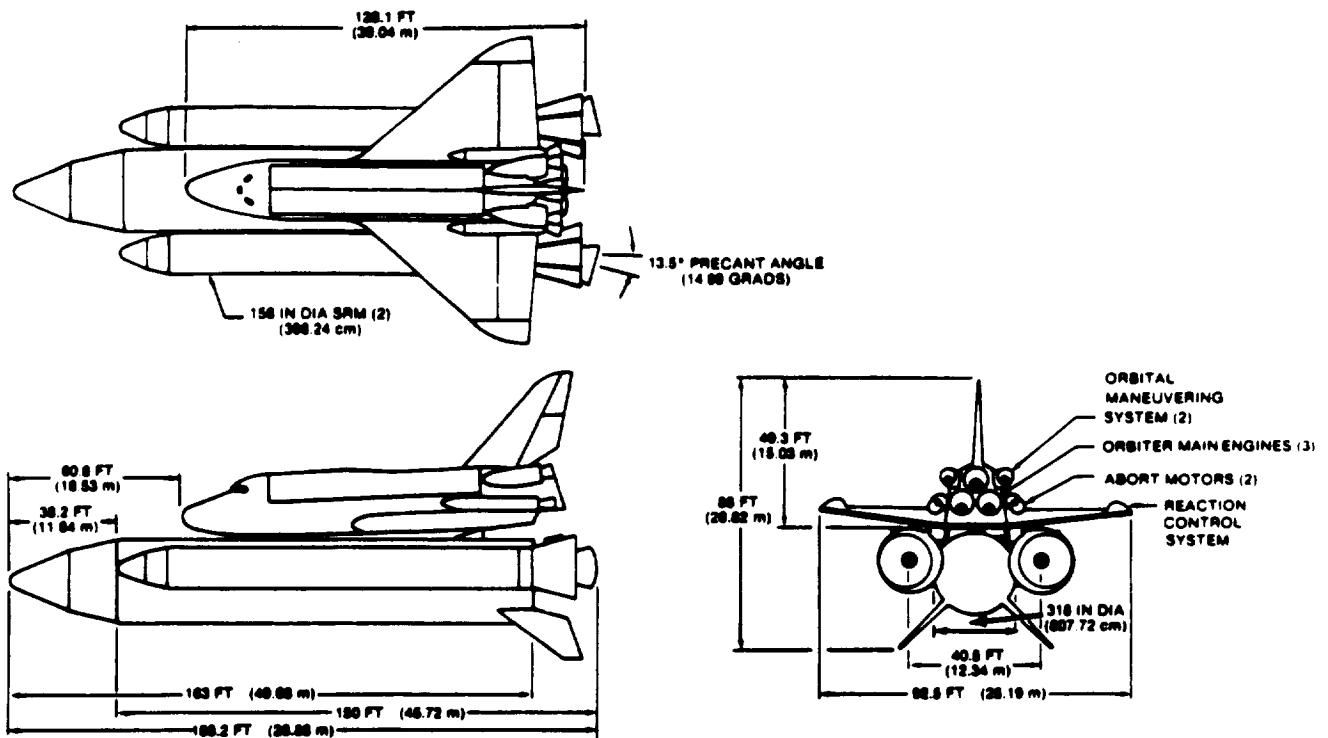
## **CONCLUDING REMARKS**

This paper has reviewed the Space Shuttle configuration development and it documents the most extensive, complicated, aerodynamic development program ever accomplished. The aerodynamic data base was derived from the approximately 100,000 hour Space Shuttle wind tunnel test program. In most past programs, wind tunnel results have often been lost or inadequately documented for future use. The results of the Space Shuttle wind tunnel testing were converted into a Chrysler DATAMAN format to facilitate its use by the analysts. This resulted in a very cost effective method of collecting the wind tunnel test results, from the many test facilities utilized, into one centralized location. This centralized concept was particularly useful to the various users by providing the capability for supplying special processing such as cross comparisons of various wind tunnel test results. Those comparisons were often in the form of comparing configurations within a given test, comparing like configurations from different tests, and comparing one test facility's results against another. Future development programs would profit from the inclusion of the data processing concepts developed in the Space Shuttle program. The resulting digital data base description and usage are discussed.

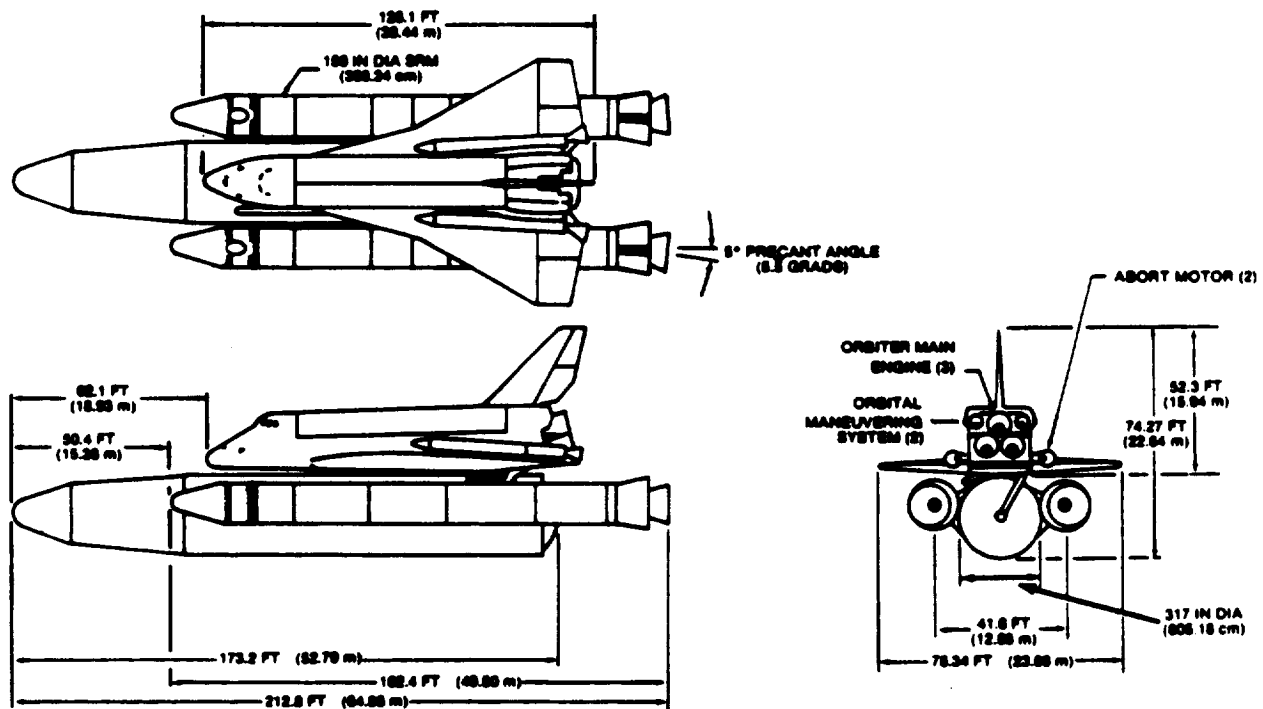
Chrysler also documented each wind tunnel test as a DATAMAN report. That documentation of the Space Shuttle wind tunnel test program along with the wind tunnel digital data base have been permanently archived at the NASA Johnson Space Center. While the documentation is readily available through the Center for AeroSpace Information, the digital data base has been distributed to NASA's Ames Research Center, Langley Research Center, and Marshall Space Flight Center, and to Rockwell International, the Space Shuttle prime contractor, to facilitate access to the data base by the analysts.

## REFERENCES

1. Glynn, J. L.; and Poucher, D. E.: Space Shuttle Phase B Wind Tunnel Test Database, Summary Report. NASA Contractor Report 4121, March 1988.
2. Whitnah, A. M.; and Hillje, E. R.: Space Shuttle Wind Tunnel Testing Program Summary. NASA Reference Publication 1125, November 1984.
3. Rockwell International Space Division: Aerodynamic Design Data Book, Vol. 1, Orbiter Vehicle, SD72-SH-0060-IM, October 1978.
4. Rockwell International Space Division: Aerodynamic Design Data Book, Vol. 1, Orbiter Vehicle, SD72-SH-0060-IL-2, April 1979.
5. Rockwell International Space Division: Aerodynamic Design Data Book, Orbiter Vehicle, STS-1, Final Report. NASA CR-160903, November 1980.
6. Rockwell International Space Division: Aerodynamic Design Data Book, Vol. 1, Orbiter Vehicle, SD72-SH-0060-1L-7, April 1982.
7. Rockwell International Space Division: Operational Aerodynamic Data Book, STS85-0118, Change 5, September 1985.
8. Kemp, N. D.: Compiling the Space Shuttle Wind Tunnel Data Base: An Exercise in Technical and Managerial Innovations. NASA CP-2283, Part 2, March 1983.
9. Romere, Paul O.; and Brown, Steve Wesley; Documentation and Archiving of the Space Shuttle Wind Tunnel Test Data Base, Volume 2: User's Guide to the Archived Data Base. NASA Technical Memorandum 104806, Vol. 2; January 1995.

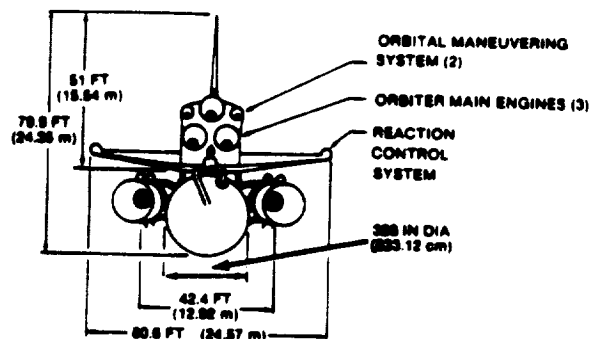
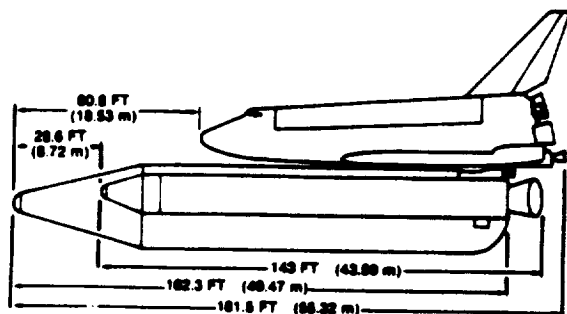
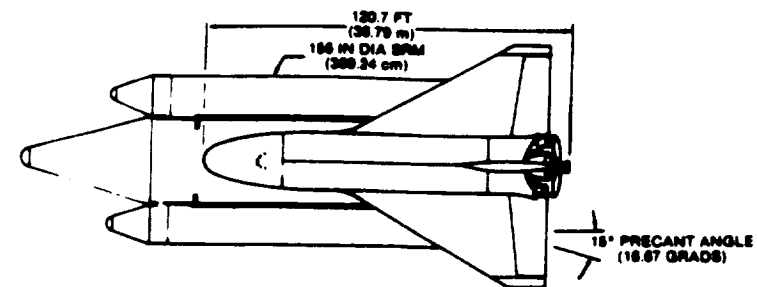


(a) GRUMMAN AIRCRAFT COMPANY CONFIGURATION

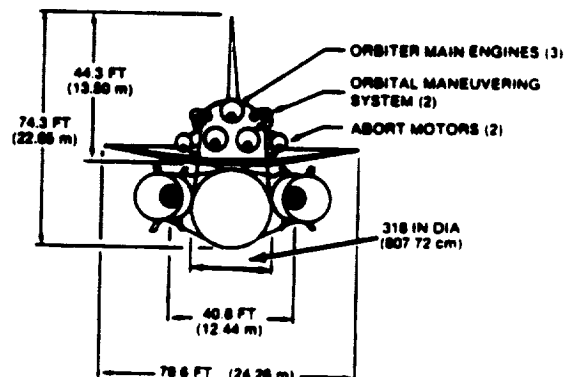
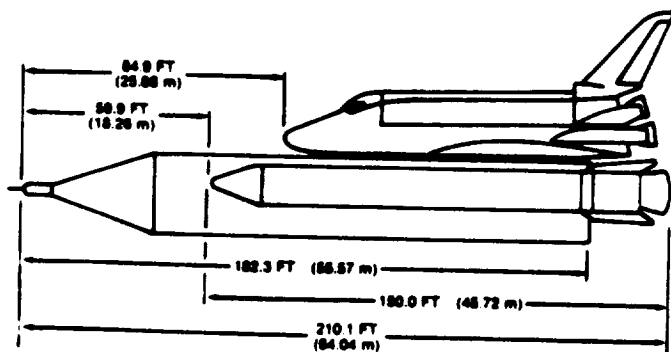
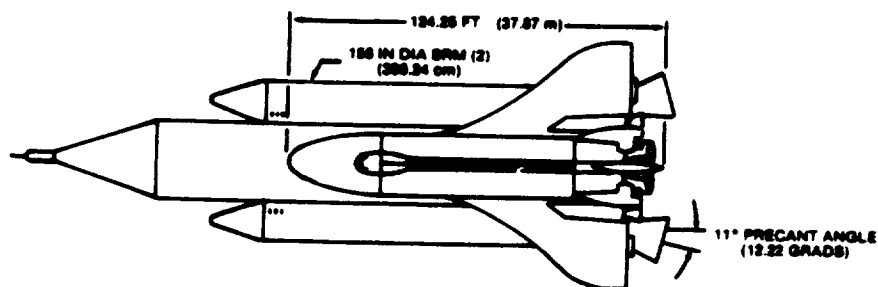


(b) LOCKHEED MISSILE AND SPACE COMPANY

Figure 1. - Space Shuttle Phase B final configurations.



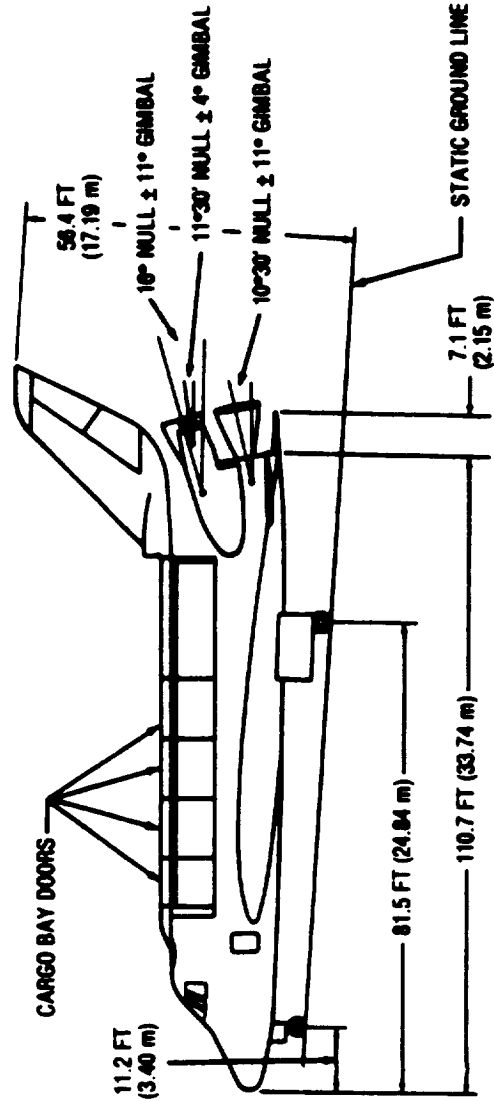
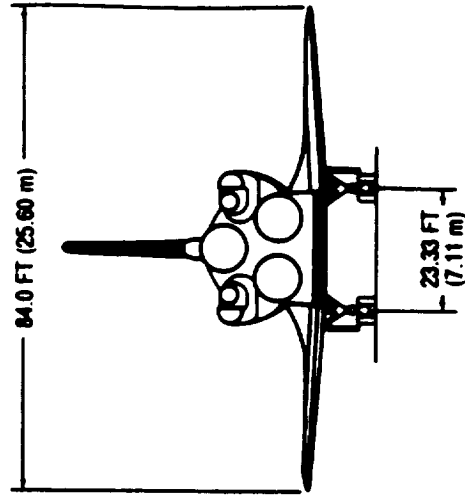
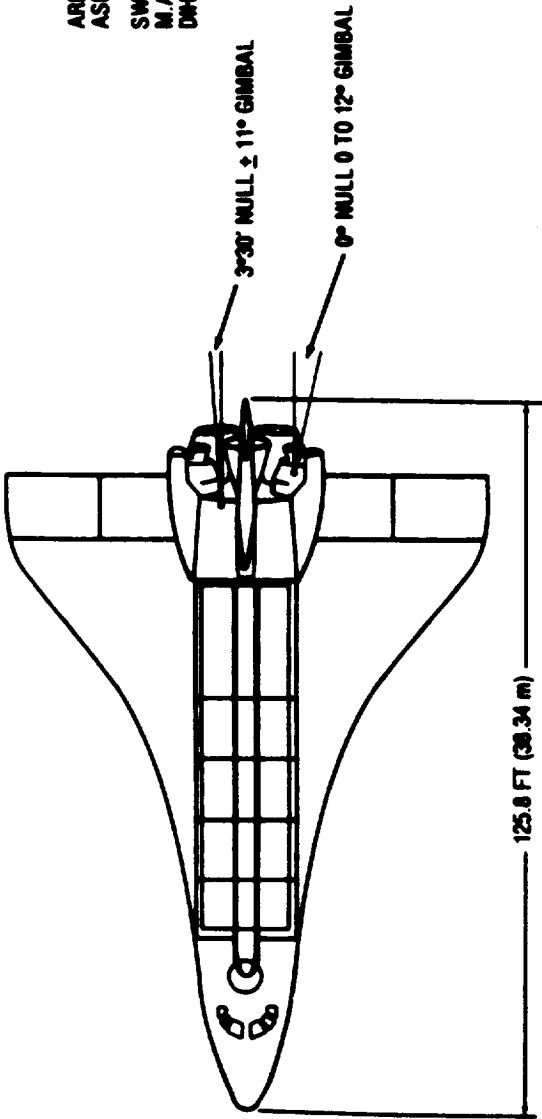
(c) MCDONNELL DOUGLAS CONFIGURATION



(d) NORTH AMERICAN/ROCKWELL CONFIGURATION

Figure 1. - Concluded.

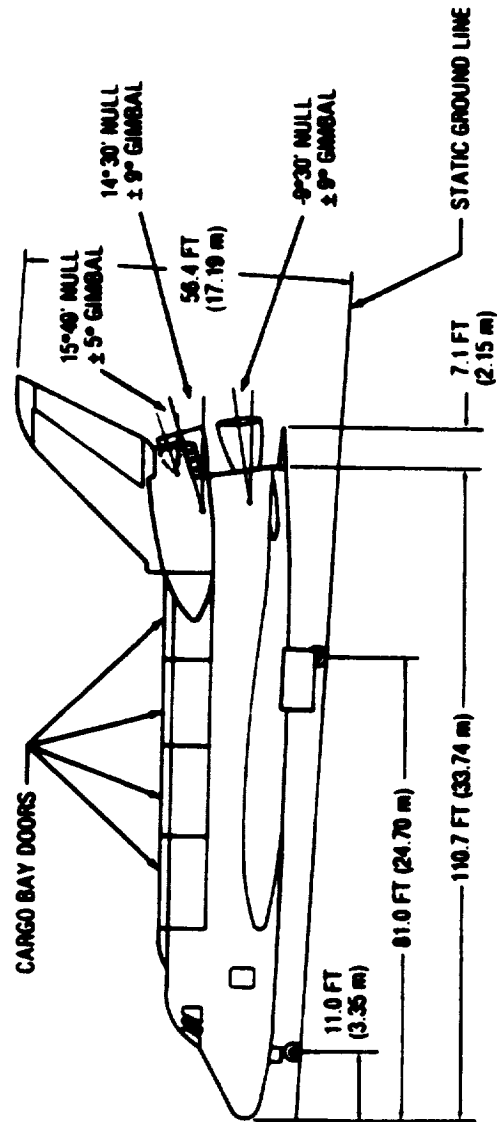
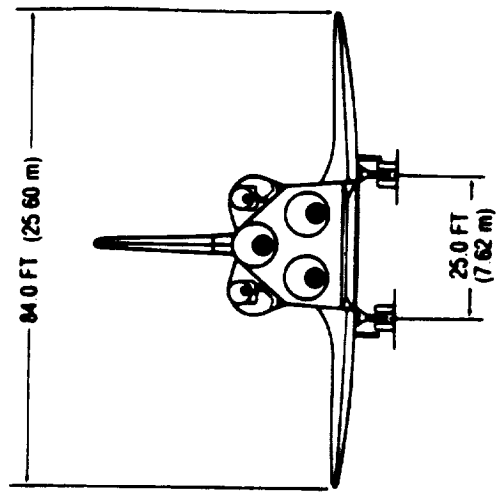
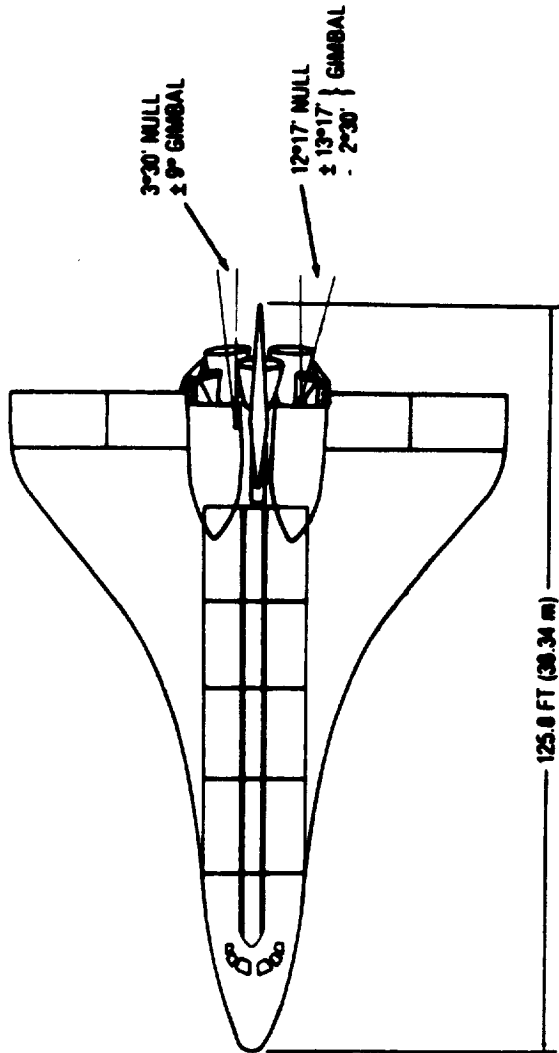
	WING	VERTICAL STAB.
AREA	3220 FT <sup>2</sup> (298.14 m <sup>2</sup> )	435 FT <sup>2</sup> (40.41 m <sup>2</sup> )
ASPECT RATIO	2.19	1.675
SWEEP (L.E.)	50°	45°
M.A.C.	525.5 IN. (1344.77 cm)	205 IN. (520.70 m)
DHEDRAL (T.E.)	3°30'	NA



(a) ATP configuration.

Figure 2. - Orbiter Vehicle dimensions; configuration evolution.

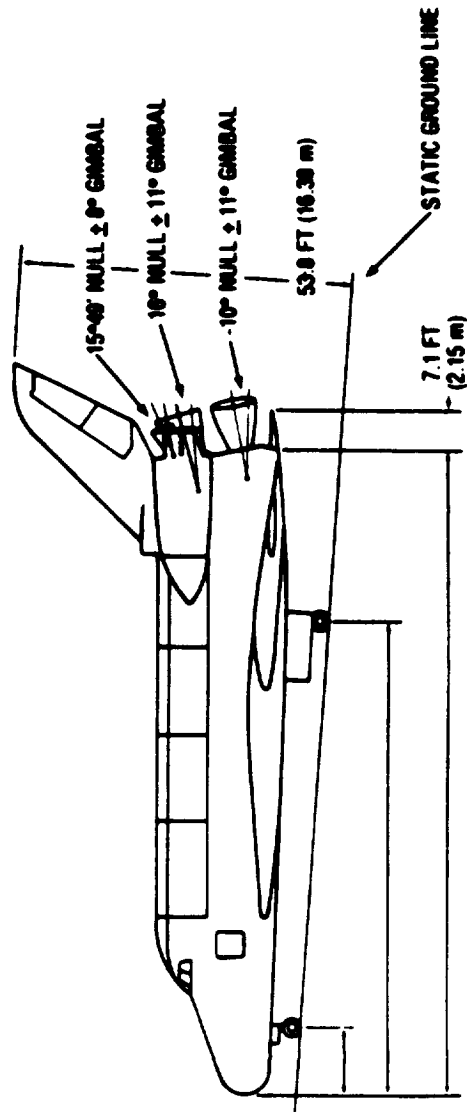
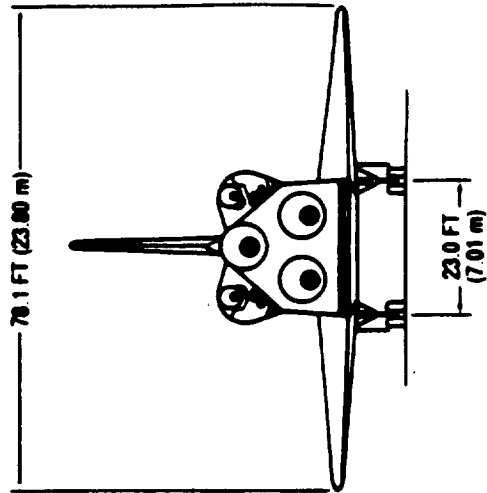
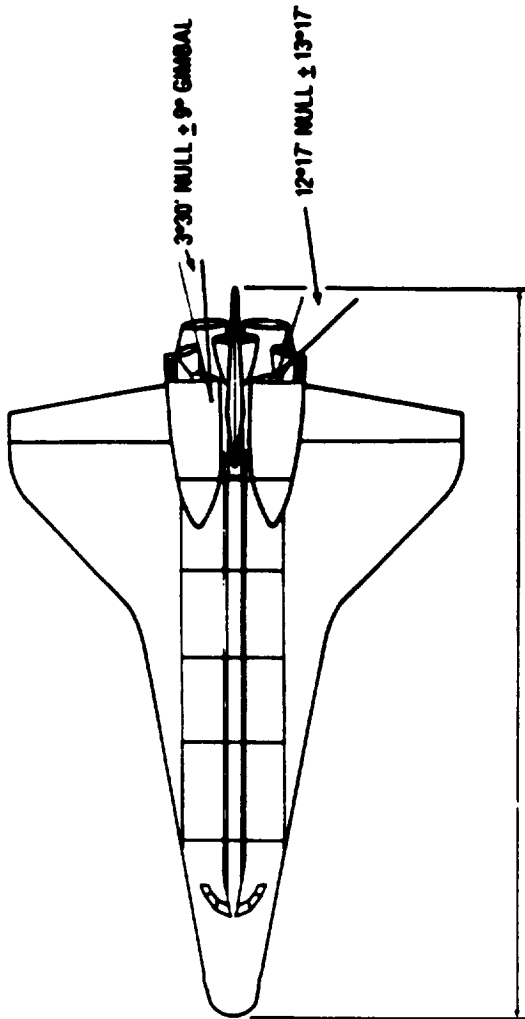
	WING	VERTICAL STAB
AREA	3220 FT <sup>2</sup> (299.14 m <sup>2</sup> )	435 FT <sup>2</sup> (40.41 m <sup>2</sup> )
ASPECT RATIO	2.19	1.68
SWEEP (L.E.)	50°	45°
M.A.C.	525.5 IN (1344.77 cm)	205.0 IN (520.70 cm)
DIHEDRAL (T.E.)	3°30'	NA



(b) PRR configuration.

Figure 2. - Continued.

	WING	VERTICAL STAB
AREA	2880 FT <sup>2</sup> (249.90 m <sup>2</sup> )	413.25 FT <sup>2</sup> (38.30 m <sup>2</sup> )
ASPECT RATIO	2.265	1.675
SWEEP (I.E.)	45°	45°
M.A.C.	474.8 IN. (1206.0 cm)	199.81 IN. (507.52 cm)
DWEDRAL (I.E.)	3°30'	



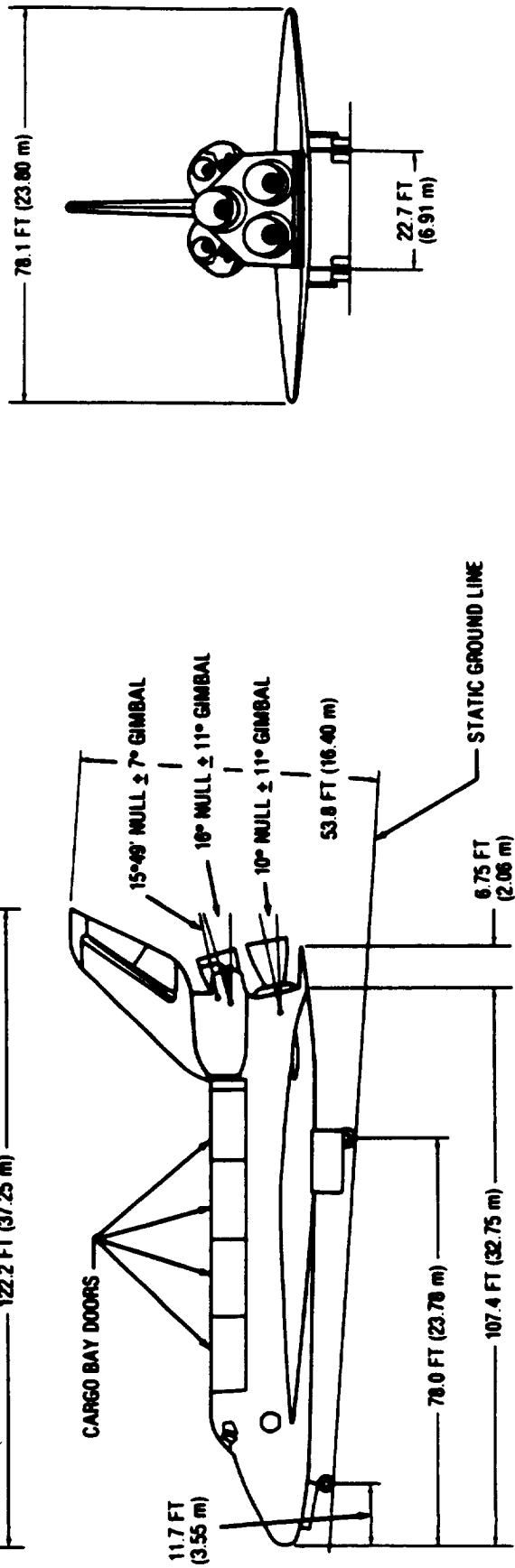
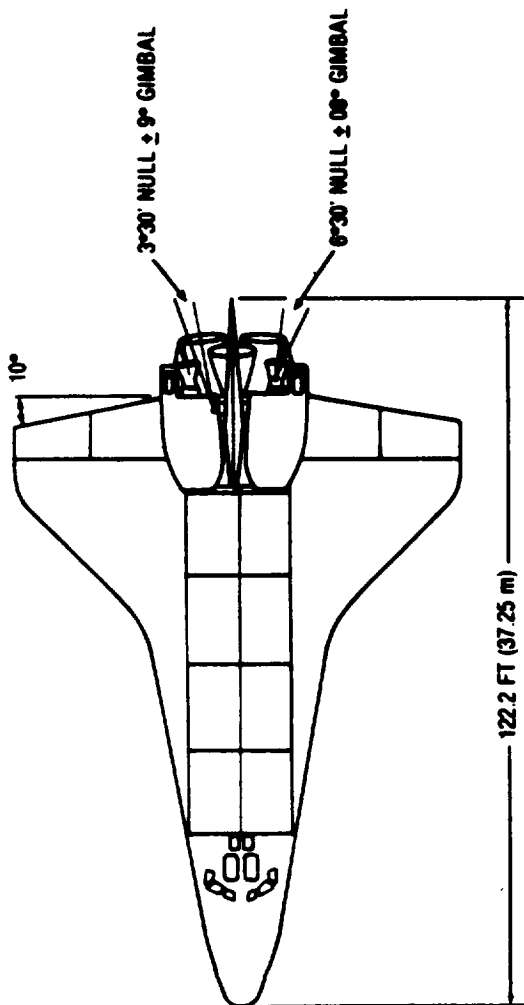
(c) Vehicle 2A.

Figure 2. - Continued.



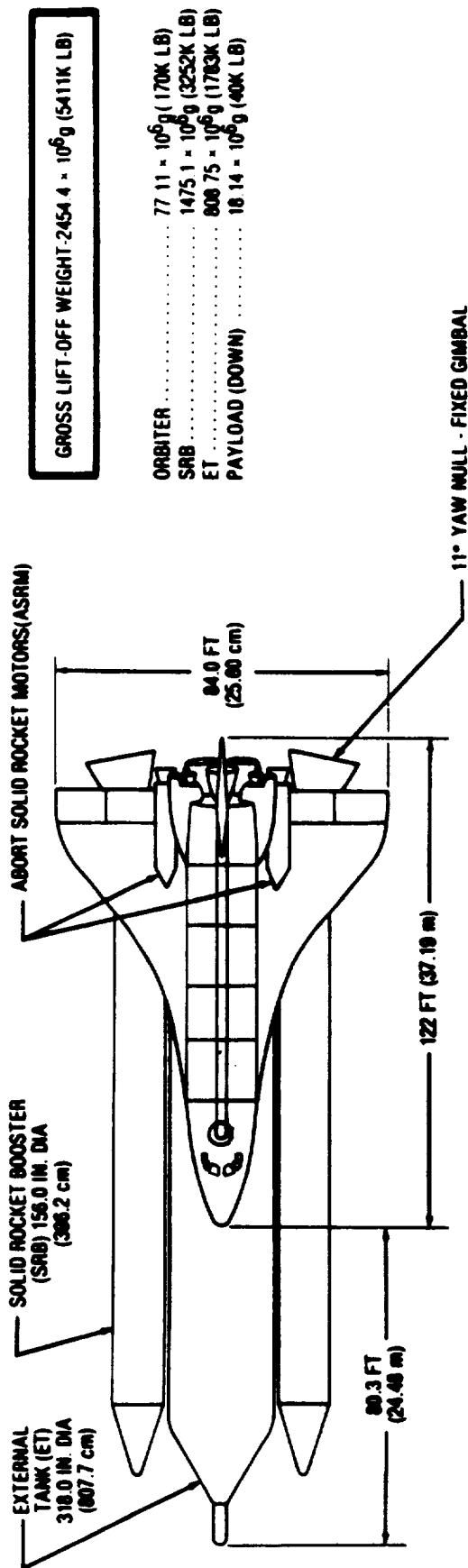


	<u>WING</u>	<u>VERTICAL STAB</u>
AREA	2690 FT <sup>2</sup> (249.90 m <sup>2</sup> )	413.25 FT <sup>2</sup> (38.39 m <sup>2</sup> )
ASPECT RATIO	2.265	1.675
SWEEP (L.E.)	45°	45°
M.A.C.	474.81 IN. (1206.0 cm)	199.81 IN. (507.52 cm)
DHEDRAL (T.E.)	3°30'	—



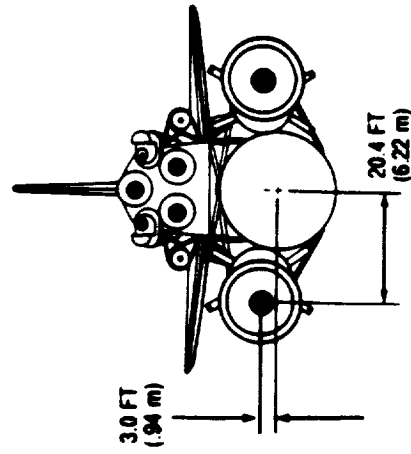
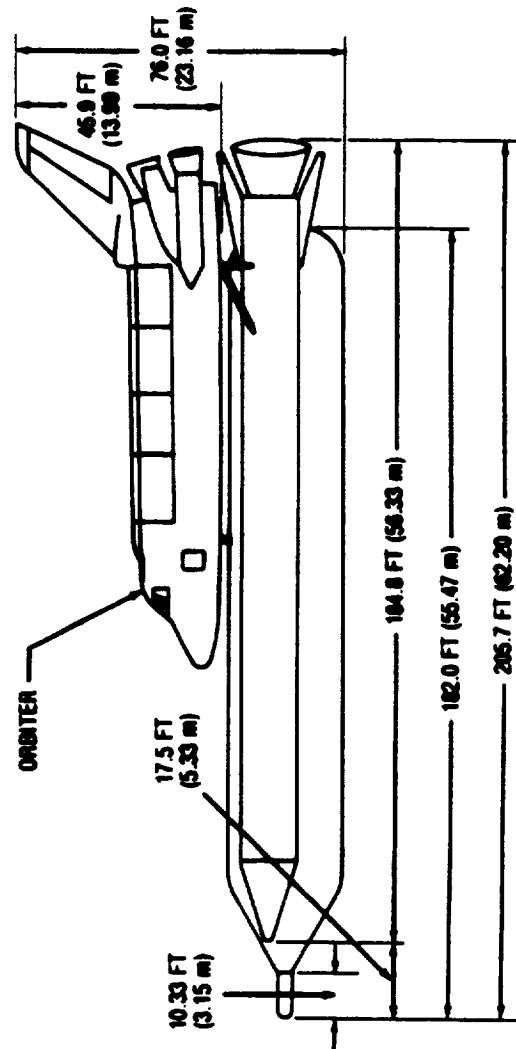
(e) Vehicles 5, 6.

**Figure 2. - Concluded.**



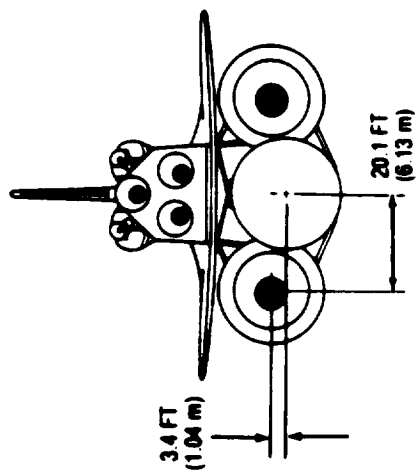
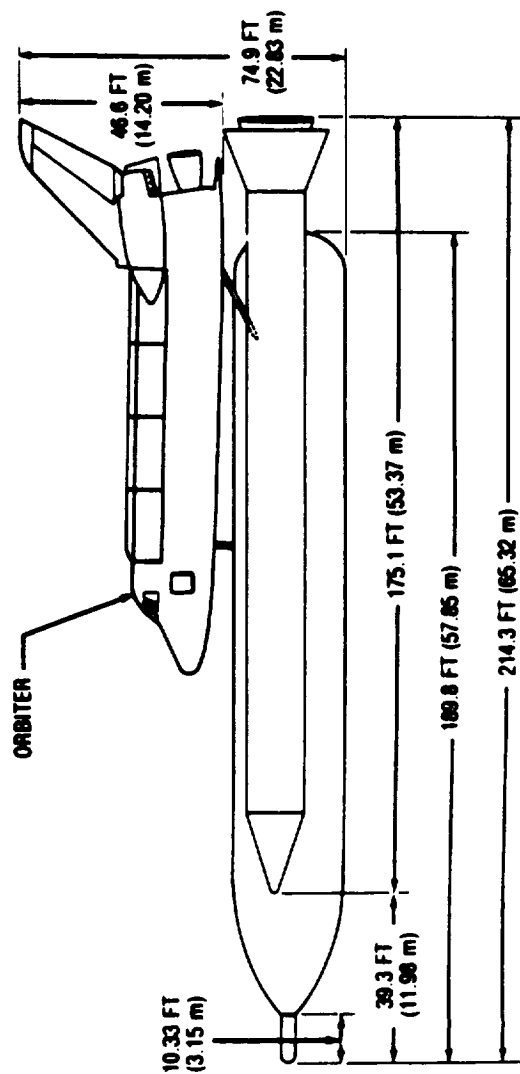
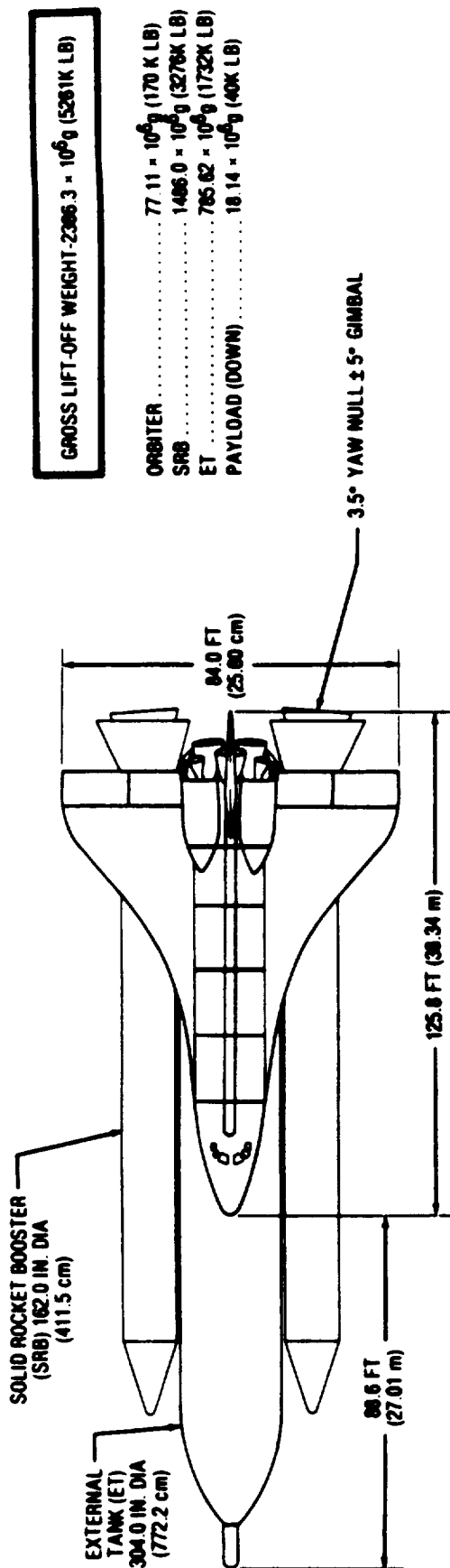
GROSS LIFT-OFF WEIGHT-2454.4 × 10<sup>6</sup>g (5411K LB)

ORBITER ..... 77.11 × 10<sup>6</sup>g (170K LB)  
 SRB ..... 1475.1 × 10<sup>6</sup>g (3252K LB)  
 ET ..... 808.75 × 10<sup>6</sup>g (1783K LB)  
 PAYLOAD (DOWN) ..... 18.14 × 10<sup>6</sup>g (40K LB)



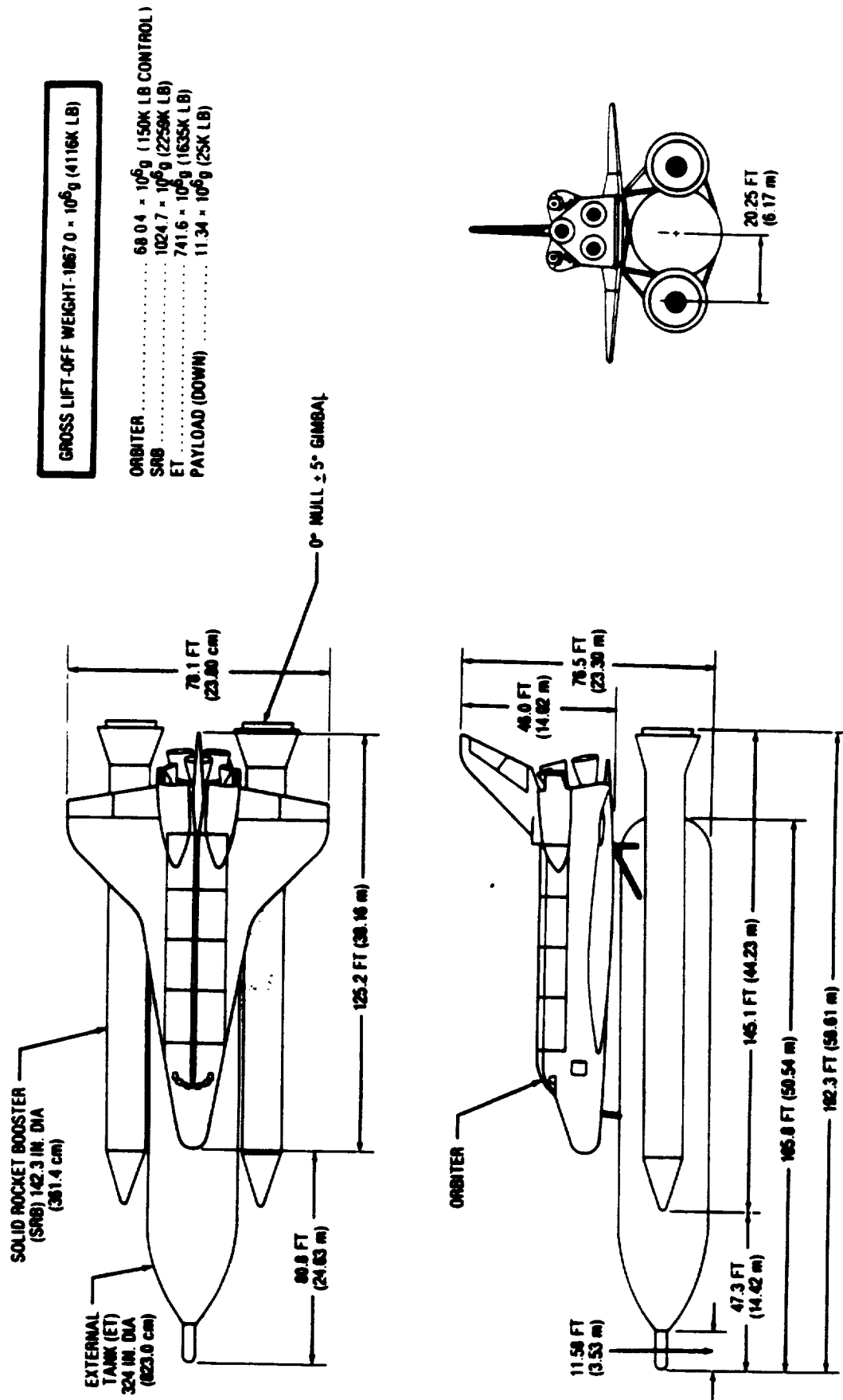
(a) ATP configuration.

Figure 3. - Integrated Vehicle dimensions; configuration evolution.



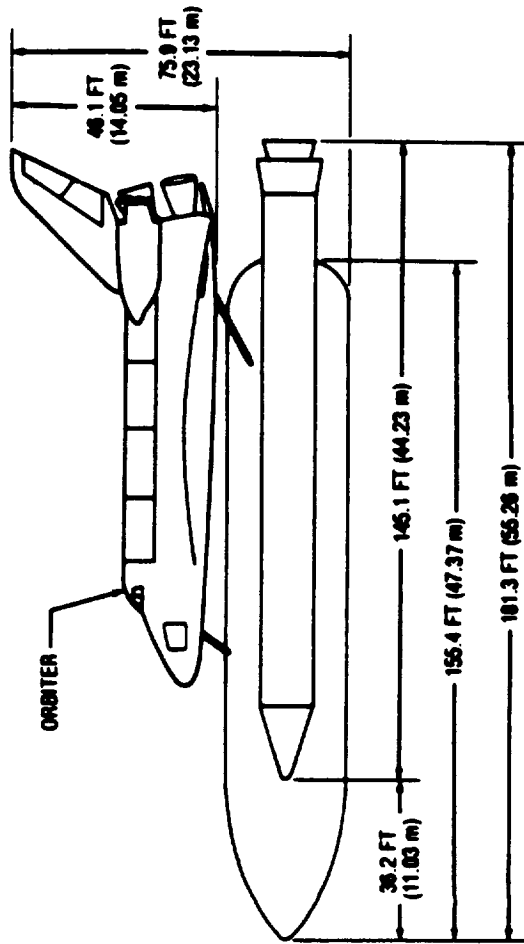
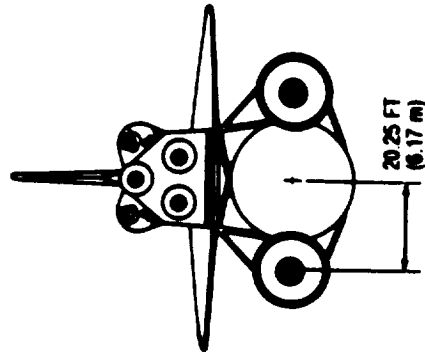
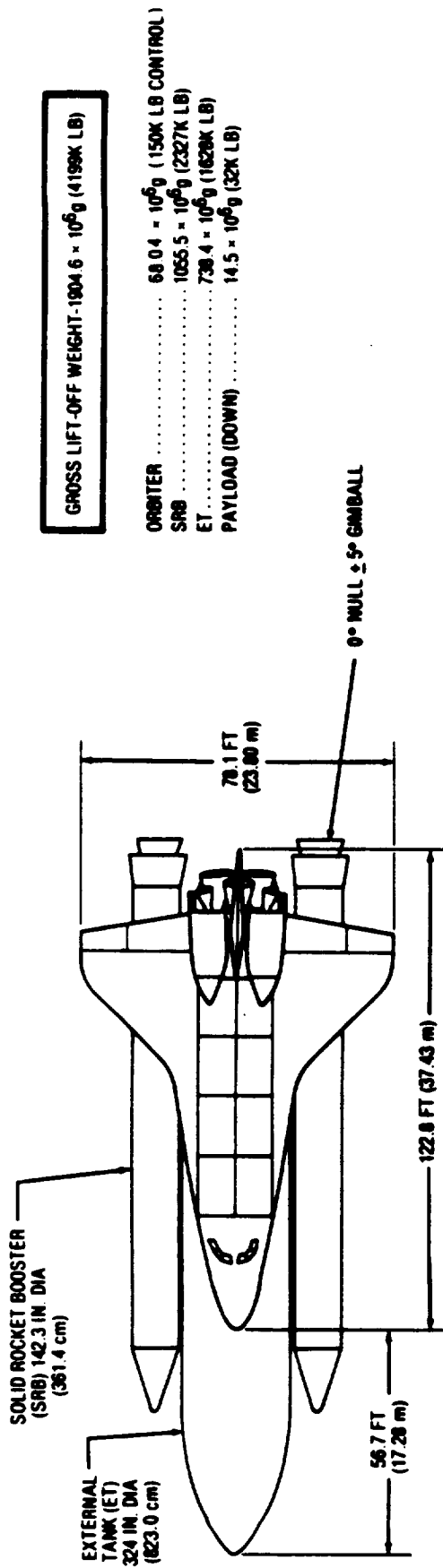
(b) PRR configuration.

Figure 3. - Continued.



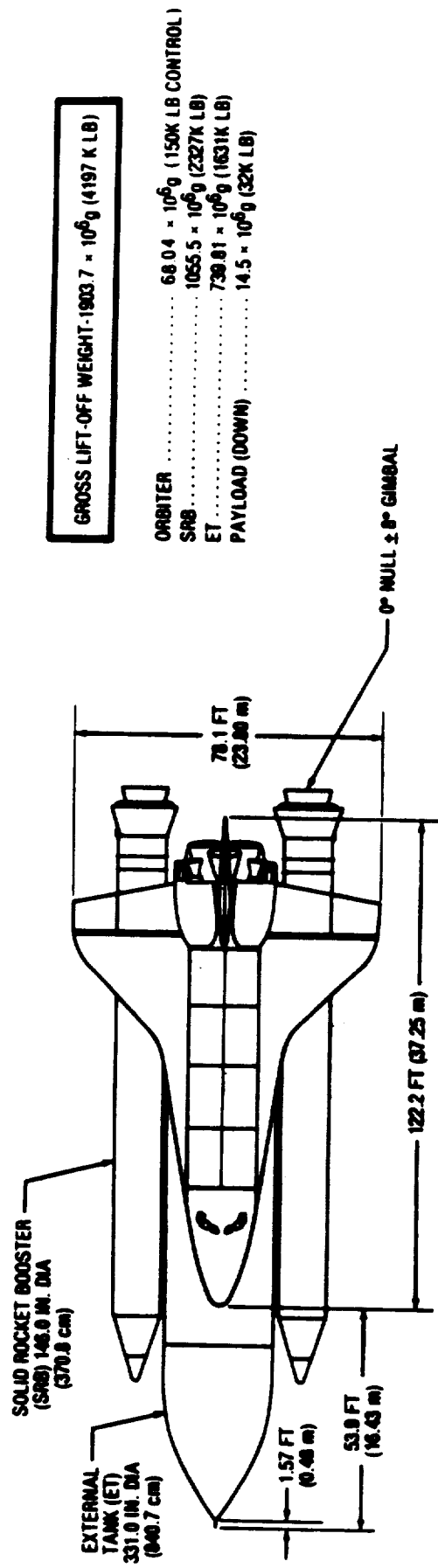
(c) Vehicle 2A.

Figure 3. - Continued



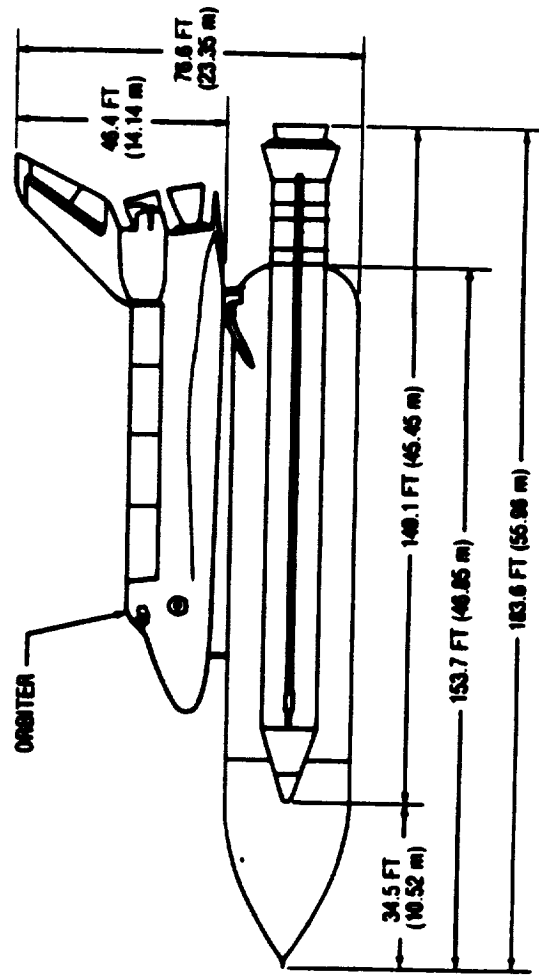
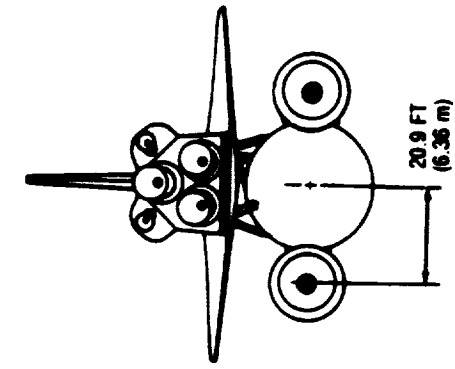
(d) Vehicles 3, 4.

Figure 3. - Continued.



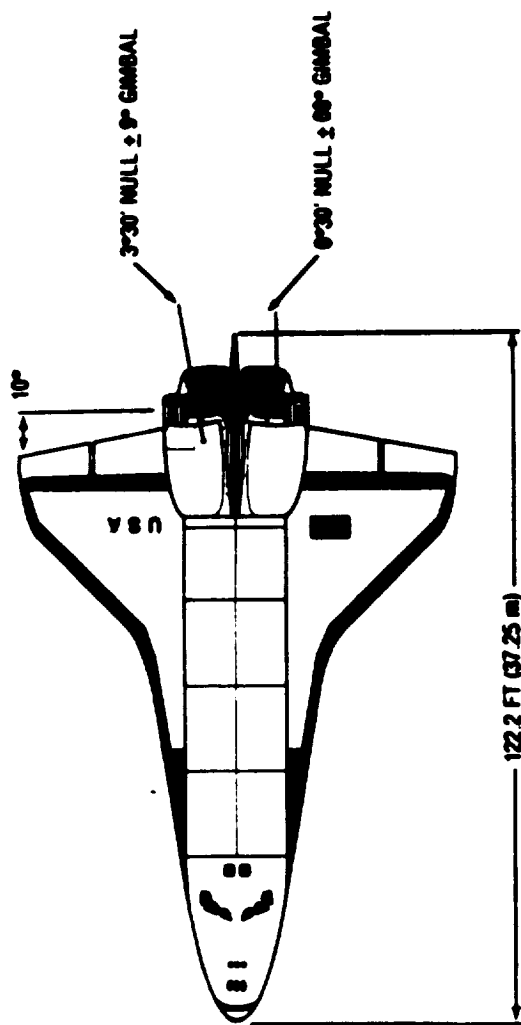
GROSS LIFT-OFF WEIGHT-1903.7 × 10<sup>6</sup>g (4197 K LB)

ORBITER	68.04 × 10 <sup>6</sup> g (150K LB CONTROL)
SRB	1055.5 × 10 <sup>6</sup> g (2327K LB)
ET	739.81 × 10 <sup>6</sup> g (1631K LB)
PAYLOAD (DOWN)	14.5 × 10 <sup>6</sup> g (32K LB)

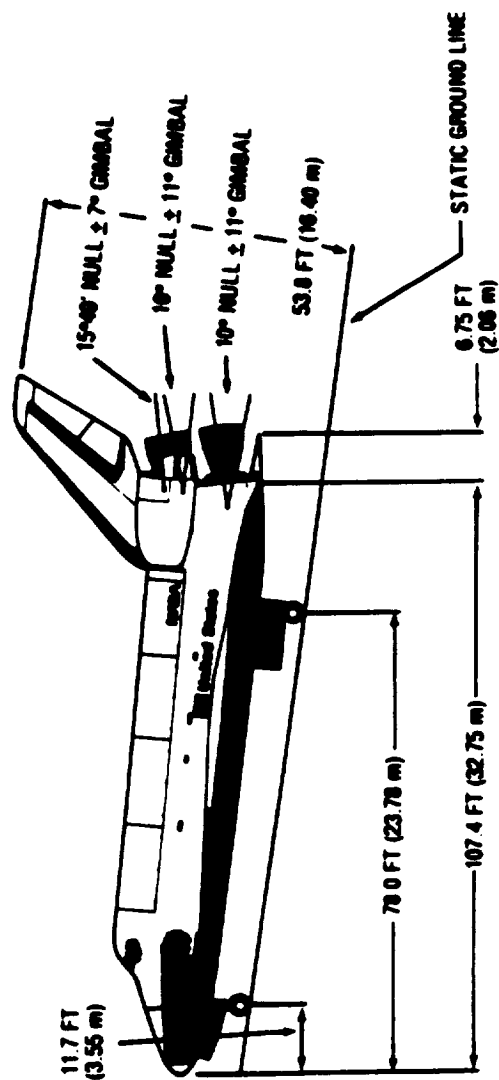
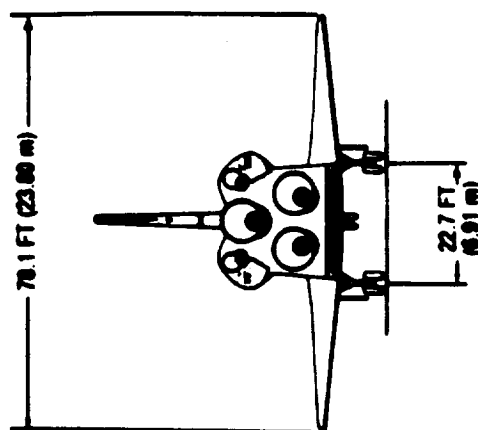


(e) Vehicles 5, 6.

Figure 3. - Concluded.



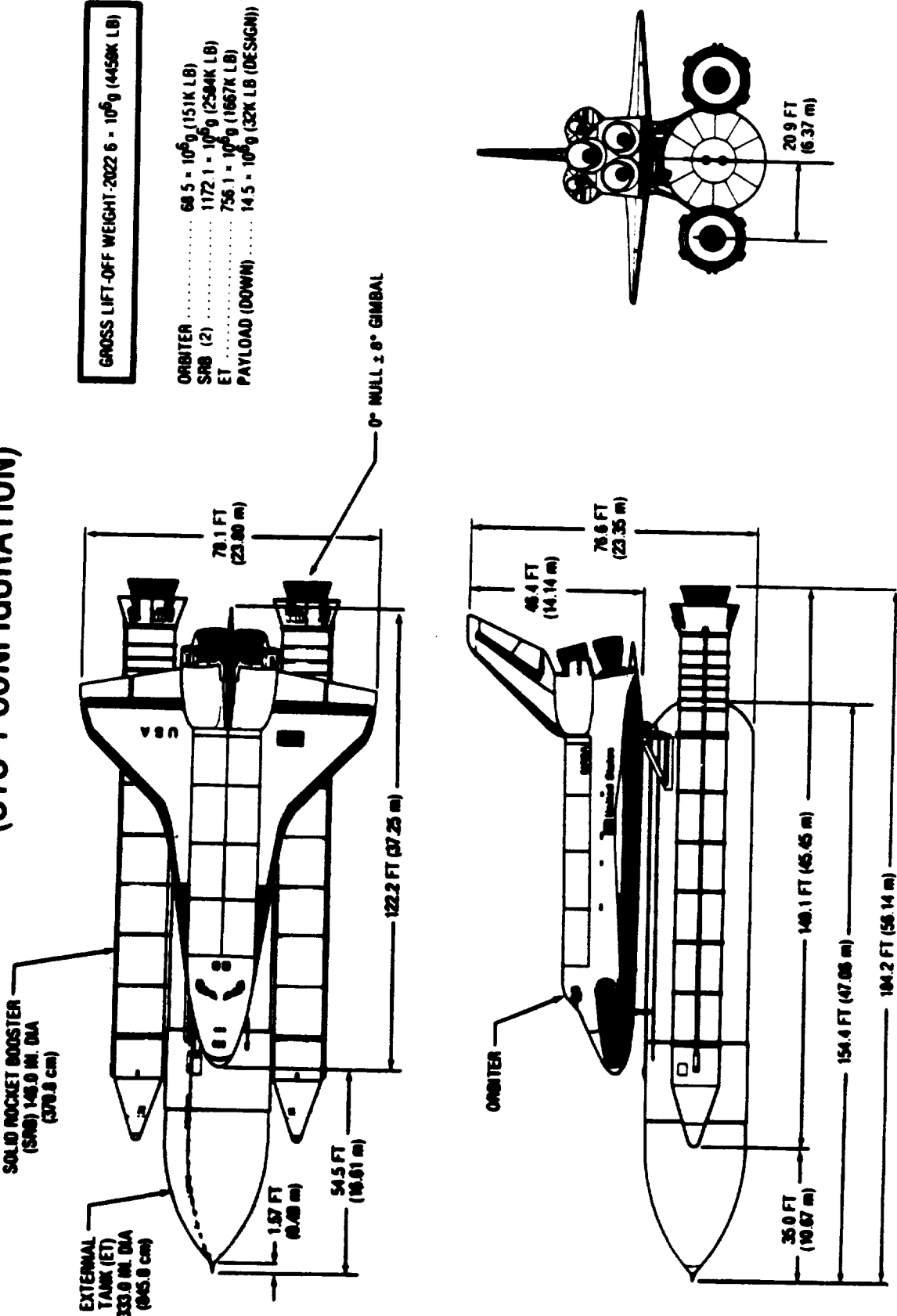
	WING	VERTICAL STAB
AREA	2600 FT <sup>2</sup> (240.90 m <sup>2</sup> )	413.25 FT <sup>2</sup> (38.30 m <sup>2</sup> )
ASPECT RATIO	2.265	1.675
SWEEP (I.E.)	45°	45°
M.A.C.	474.81 IN. (1208.0 cm)	199.81 IN. (507.52 cm)
Dihedral (T.E.)	3°30'	



(a) Orbiter Vehicle OV-102.

Figure 4. - STS-1 mission configurations.

# SPACE SHUTTLE INTEGRATED VEHICLE (STS-1 CONFIGURATION)



(b) Integrated Vehicle.

Figure 4. - Concluded



### Table 1. Sample of Data Set/Run Number Collation Summary

DATE : 8/8/78 REV.																			
DATA SET/RUN NUMBER COLLATION SUMMARY																			
DATA SET IDENTIFIER	CONFIGURATION	SCHD.		PARAMETERS/VALUES				NO. OF RUNS	MACH NUMBERS (OR ALTERNATE INDEPENDENT VARIABLE)										
		$\alpha$	$\beta$	$\delta$	SR	Q	P		.60	.80	.90	1.10	1.20	1.40	1.55				
R4N001	FLEX TAIL	A	0	25	0	300	0				43	73	81	114	125				
02						500					35	46	59	88	105	117			
03						700						62	96	110	122				
04						750					50								
05			2			300							82						
06						500							89		118				
07						700							97		123				
08		0	B			300						70	76	111					
09						500	0				36	47	55	85	102	115			
10						500	-90				37	48	56	91	106	120			
11						700	0						60	92	109				
12		5				300						42	71	80	112	124			
13						500						44	57	86	103	116			
14						500						45							
15						700							74	94	107	121			
R4N073						750								93					
R4N016	✓	5	B	25	0	750	0					49							
		</																	

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL BASE FILES LISTING**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1001	103,150	S-1002	MSFC 14-IN TRISONIC	451	F1001001	19
		S-1801				
1002	TM-X62035	S-0005	ARC 3.5-FT HYPERSONIC	078	F1002002	A6
1003	103,152	S-1802	MSFC 14-IN TRISONIC	453	F1003003	17
1004		S-0011	LARC 20-IN HYPERSONIC	6315	F1004004	L1
		S-0014				
1005	103,153	S-1809	GAC 8X10-FT SUBSONIC	280	F1005005	C3
1006	103,151	S-1808	AEDC C / HYPERSONIC	055	F1006006	T4
1007	103,154	S-0016	MAC LOW SPEED	223	F1007007	C1
1008	103,155	S-0006	TAM 7X10-FT SUBSONIC	S-VI	F1008008	G1
1009		S-1206	LARC 22-IN HELIUM	7341/ 7343	F1009009	L2
1010	103,156	S-0201	NRLAD LOW SPEED	629	F1010010	C4
1011		S-0009	ARC 6X6-FT SUPERSONIC	465	F1011011	A7
1012		S-0036	ARC 11-FT TRANSONIC	481	F1012012	A5
1013		S-1207	LARC LOW-TURBULENCE PRES	050	F1013013	L3
1014	103,157	S-1807	MAC LOW SPEED	132	F1014014	C2
1015		S-1201	LARC LOW-TURBULENCE PRES	047	F1015015	L6
1016		H-1201	LARC CONTINUOUS-FLOW HYP	050	NO DIGITIZED DATA INPUT	
1017		S-1204	LARC UNITARY PLAN	886	F1017016	L4
1018		S-1205	LARC LOW-TURBULENCE PRES	049	F1018017	L7
1019		S-1203	LARC UNITARY PLAN	913	F1019018	L5
1020		H-0202	LARC CONTINUOUS FLOW HYP	052	NO DIGITIZED DATA INPUT	
1021	TM-X62066	S-1806	LARC LOW-TURBULENCE PRES	484	F1021019	A3
1022		S-1208	LARC 7X10-FT SUBSONIC	905	F1022020	L8
1023		S-1202	LARC 20-IN HYPERSONIC	6329	F1023021	LA
1024		H-0204	LARC MACH 8 VAR DEN	123- 126- 180- 188	NO DIGITIZED DATA INPUT	
1025	103,158	S-0203	GDC 4-FT HIGH SPEED	291	F1025022	C6
1026		S-0204	ARC 6X6-FT SUPERSONIC	503	F1026023	AE
1027	119,962	S-0209	MSFC 14-IN TRISONIC	468	F1027024	21
1028	TM-X62039	S-0405	ARC 6X6-FT SUPERSONIC	514	F1028025	A9
		S-0406				
1029	103,159	S-0205	GDC 18-IN HYPERSONIC	247	F1029026	C9
1030	119,963	S-0202	GDC 8X12-FT SUBSONIC	579	F1030027	C7
1031	TM-X62065	S-1805	ARC 3.5-FT HYPERSONIC	088	F1031028	A4
1032		H-0205	LARC MACH 8 VAR-DEN HYP	137- 146/ 189- 205	NO DIGITIZED DATA INPUT	
1033	103,164	S-0024	TAM 7X10-FT SUBSONIC	XXIV	F1033029	G4
1034	103,160	S-0232	NRLAD LOW SPEED	632	F1034030	CG
1035	103,161	S-0404	MAC LOW SPEED	1351	F1035031	CC
1036	V1	H-0401	LARC MACH 8 VAR-DEN HYP	HT	NO DIGITIZED DATA INPUT	
1036	V2	H-0402	LARC CONTINUOUS FLOW HYP			
		H-0403				
1037	103,193	S-0201	NRLAD LOW SPEED	630	F1037032	C5
1038	TM-X62069	S-0065	ARC 6X6-FT SUPERSONIC	486	F1038033	AA
1039	103,162	S-0228	GDC 8X12-FT SUBSONIC	580	F1039034	C8
1040	103,163	S-0407	MAC LOW SPEED	235	F1040035	CB
1041	103,194	S-0429	MAC LOW SPEED	240	F1041036	CF
1042		S-0041	ARC 6X6-FT SUPERSONIC	488	F1042037	AN

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1043	103,085	S-0235	MSFC 14-IN TRISONIC	471	F1043038	23
1044	103,195	S-1044	MSFC 14-IN TRISONIC	470	F1044039	24
1045		S-1210	LARC LOW-TURBULENCE PRES	50-2	F1045040	LF
1046		S-1401	ARC 6X6-FT SUPERSONIC	522	F1046041	AQ
1047		S-1209	LARC CONTINUOUS-FLOW HYP	054	F1047042	LB
1048		S-1213	LARC 20-IN HYPERSONIC	6355/ 6329	F1048043	LA
1049		S-0208	LARC LOW-TURBULENCE PRES	052	F1049044	L9
1050	TM-X62070	S-0206	ARC 6X6-FT SUPERSONIC	505	F1050045	AG
1051	103,196	S-0217	MSFC 14-IN TRISONIC	466	F1051046	22
1052	103,197	S-0207	GDC 4-FT HIGH SPEED	304	F1052047	CA
1053	103,196	S-1803	GAC 7X10-FT SUBSONIC	279	F1053048	CL
1054	103,199	S-0410	MAC LOW SPEED	239	F1054049	CE
		S-0411				
1055	103,200	S-1006	MSFC 14-IN TRISONIC	476	F1055050	25
1056		H-0201	LARC CONTINUOUS-FLOW HYP	1-58	NO DIGITIZED DATA INPUT	
		H-0203	LARC VAR-DENSITY HYPER			
1057	119,853	S-0018	TAM 7X10-FT SUBSONIC	S-18/ S-35	F1057051	G3
		S-0035				
1058	119,854	S-0028	LTV HIGH SPEED	S-28	F1058052	CH
1059		S-1214	LARC 22-IN HELIUM	7369	F1059053	LH
1060	119,855	S-0008	TAM 7X10-FT SUBSONIC	S-8	F1060054	G6
1061		S-1211	LARC CONTINUOUS FLOW HYP	054	F1061055	LC
1062	119,856	S-0038	TAM 7X10-FT SUBSONIC	S-37	F1062056	G7
1063	TM-X62072	S-0042	ARC 6X6-FT SUPERSONIC	524	F1063057	A0
1064		S-0244	LARC LOW-TURBULENCE PRES	545	F1064058	LD
1065		S-0414	ARC 6X6-FT SUPERSONIC	508	F1065059	AB
1066	TM-X62037	S-0412	ARC 6X6-FT SUPERSONIC	504	F1066060	AD
1067	119,857	S-0423	MAC LOW SPEED	248	F1067061	CP
1068		S-1402	LARC UNITARY PLAN	9143	F1068062	LL
1069		S-1212	LARC UNITARY PLAN	922	F1069063	LI
1070		H-0214	LARC MACH 8 VARIABLE DEN	001	NO DIGITIZED DATA INPUT	
1071		S-0415	ARC 3.5-FT HYPERSONIC	111/ 113	F1071064	AM/AU
		S-0434				
1072		S-0413	ARC 3.5-FT HYPERSONIC	104	F1072065	AJ
1073	119,858	S-0039	TAM 7X10-FT SUBSONIC	S-39	F1073066	G2
1074	119,859	S-0430	MAC LOW SPEED	138	F1074067	CN
1075	V1	S-0219	ARC 14-IN TRISONIC	511	F1075068	AH
	V2					
1076	119,860	S-0240	MSFC 14-IN TRISONIC	478	F1076069	27
		S-0241				
1077	119,861	S-0419	MAC LOW SPEED	249	F1077070	C0
		S-0426				
1078	TM-X62044	S-0204	ARC 6X6-FT SUPERSONIC	503/ 513	F1078071	AE/AF
		S-0218				
1079	R-01	S-0602	UW 8X12-FT SUBSONIC	1021	F1079072	U1
1080	TM-X62038	S-0416	ARC 3.5-FT HYPERSONIC	112	F1080073	AL
1081	119,862	S-0603	GAC 7X10-FT SUBSONIC	289	F1081074	CQ
1082	TM-X62045	S-0204	ARC 6X6-FT SUPERSONIC	513/ 503	F1082075	AF/AE
		S-0218				
1083	TM-X64042	S-0426	ARC 6X6-FT SUPERSONIC	527	F1083076	AT
1084		S-0224	LARC CONTINUOUS-FLOW HYP	063	F1084077	LQ
1085	TM-X62073	S-0801	ARC 6X6-FT SUPERSONIC	542	F1085078	AV
1086		S-1217	LARC 22-IN HELIUM	7377	F1086079	LZ

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1087		S-0238	LARC LOW-TURBULENCE PRES	059	F1087080	LS
1088		S-1215	LARC 22-IN HELIUMLI	7376	F1088081	LV
1089		S-1401	ARC 6X6-FT SUPERSONIC	9143	DIGITIZED DATA	NOT AVAIL
		S-1402				
1090	119,965	S-0408	MAC LOW SPEED	237	F1090082	CD
1091	119,966	S-1034	MSFC 14-IN TRISONIC	485	F1091083	30
1092	119,967	S-1019	AEDC 16-FT PWT	TC135	F1092084	RT
1093		S-0231	LARC CONTINOUS-FLOW HYP	064	F1093085	LG
1094	TM-X62108	S-0428	LARC 3.5-FT HYPERSONIC	125	F1094086	AX
1095		S-0224	LARC 20-IN HYPERSONIC	6366	F1095087	LU
1096		S-0227	LARC UNITARY PLAN	951	F1096088	LP
1097		S-1216	LARC 8-FT TRANSONIC PRES	574	F1097089	M0
1098		H-0209	LARC UNITARY PLAN	945	NO DIGITIZED DATA	INPUT
1099	TM-X62059	S-0433	ARC 6X6-FT SUPERSONIC	557	F1099090	AY
1100		S-0220	LARC LOW-TURBULENCE PRES	055	F1100091	LE
1101		S-1219	LARC UNITARY PLAN	944/ 962	F1101092	M7
1102	119,992	S-0213	MSFC 14-IN TRISONIC	481	F1102093	28
1103		S-0802	LARC UNITARY PLAN	955	F1103094	M2
1104	V1	S-0212	ARC 3.5-FT HYPERSONI	109A/ 109B	F1104095	AK
	V2					
1105		S-0225	LARC 8-FT TRANSONIC PRES	573	F1105096	L0
1106		S-0221	LARC LOW-TURBULENCE PRES	057	F1106097	LN
1107		S-1218	LARC LOW-TURBULENCE PRES	058	F1107098	M1
1108	119,973V1	S-1023	AEDC A / SUPERSONIC	1163	F1108099	T8
	119,972V2					
	119,971V3					
	119,968V4					
	119,969V5					
	119,970V6					
	119,985V7					
1109	119,974	S-0237	GDC 8X12-FT SUBSONIC	587	F1109100	CM
1110	119,975	S-0247	GDC 8X12-FT SUBSONIC	587	F1110101	CV
1111	TM-X62115	S-0612	ARC 6X6-FT SUPERSONIC	550	F1111102	BD
1112	TM-X62060	S-0608	ARC 6X6-FT SUPERSONIC	547	F1112103	BB
1113		S-1222	LARC CONTINOUS-FLOW HYP	062	F1113104	M9
1114	119,976	S-1018	MSFC 14-IN TRISONIC	477	F1114105	26
1115	119,986	S-0030	LTV HIGH SPEED	S-30	F1115106	CU
1116	TM-X62049	S-0431	ARC 6X6-FT SUPERSONIC	510	F1116107	AR
1117	V1	S-0424	LARC UNITARY PLAN	963	F1117108	LR
	V2					
	V3					
1118	V1	S-0431	ARC 6X6-FT SUPERSONIC	512	F1118109	AC
	V2					
1119	119,977	S-0236	MSFC 14-IN TRISONIC	489	F1119110	31
1120	119,976	S-0436	MAC LOW SPEED	258	F1120111	CZ
1121	R-01	S-0239	ARC 6X6-FT SUPERSONIC	526	F1121112	AS
1122		S-0606	ARC 6X6-FT SUPERSONIC	546	F1122113	AW
1123		S-1220	LARC CONTINOUS-FLOW HYP	061	F1123114	LT
1124	119,979	S-0215	NRLAD LOW SPEED	633	F1124115	CJ
1125	119,993	P-1403	AEDC 16-FT TRANSONIC	250	DIGITIZED DATA	NOT AVAIL
1126	119,980	S-0246	MSFC 14-IN TRISONIC	484	F1126116	29
1127		S-0229	ARC 6X6-FT SUPERSONIC	548	F1127117	AZ

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1128	120,079	S-0631	TBC 4-FT SUPERSONIC	558	F1128118	DC
1129	V1	P-0203	ARC 6X6-FT SUPERSONIC	509	F1129001	AX
	V2					
	V3					
1130	119,994V1	S-0242	MSFC 14-IN TRISONIC	490	F1130119	32
	V2					
	V3					
	V4					
1131	TM-X62078	H-0207	ARC 3.5-FT HYPERSONIC	106	DIGITIZED DATA	NOT AVAIL
1132	CANCEL	P-0201	ARC 3.5-FT HYPERSONIC	099	DIGITIZED DATA	NOT AVAIL
1133	CANCEL	P-0202	ARC 3.5-FT HYPERSONIC	100	DIGITIZED DATA	NOT AVAIL
1134	TM-X62077	H-0206	ARC 3.5-FT HYPERSONIC	105	DIGITIZED DATA	NOT AVAIL
1135	CANCEL	H-0208	ARC 3.5-FT HYPERSONIC	107	DIGITIZED DATA	NOT AVAIL
1136	TM-X62062	S-1601	ARC 6X6-FT SUPERSONIC	561	F1136120	BC
1137	TM-X62061	S-0611	ARC 6X6-FT SUPERSONIC	551	F1137121	BC
1138		H-0406	LARC MACH 8 VAR-DEN HYP	4-27	NO DIGITIZED DATA	INPUT
1139	119,995V1	S-1009	NSRDC 7X10-FT TRANSONIC	3110	F1139122	N2
	119,996V2					
	119,997V3					
	119,998V4					
1140	119,961	S-1035	MSFC 14-IN TRISONIC	491	F1140123	33
1141	TM-X62118	S-0229	ARC 6X6-FT SUPERSONIC	563	F1141124	BA
1142	119,982	S-0610	GAC 7X10-FT SUBSONIC	290	F1142125	CW
1143		H-0801	LARC MACH 8 VAR-DEN HYP	4/5- 4/9	NO DIGITIZED DATA	INPUT
1144		S-0245	LARC UNITARY PLAN	951B	F1144126	MD
1145		H-0213	LARC MACH 8 VAR-DEN HYP		NO DIGITIZED DATA	INPUT
1146		H-0602	LARC CONTINUOUS-FLOW HYP	066	NO DIGITIZED DATA	INPUT
1147		S-1223	LARC V/STOL TRANSITION	007	F1147127	ME
1148	119,983	S-0616	MSFC 14-IN TRISONIC	492	F1148128	34
1149		S-1224	LARC LOW-TURBULENCE PRES	062	F1149129	MF
1150		S-0230	LARC LOW TURBULENCE PRES	064	DIGITIZED DATA	NOT AVAIL
1151		S-1221	LARC CONTINUOUS-FLOW HYP	068/ 071	F1151130	MC
1152	119,999	S-0223	MSFC 14-IN TRISONIC	493	F1152131	35
1153	120,000	S-1026	MSFC 14-IN TRISONIC	494	F1153132	36
1154	119,984	H-0601	GAC 36-IN HYPERSONIC	017	NO DIGITIZED DATA	INPUT
1155	119,987	S-0248	MSFC 14-IN TRISONIC	495	F1155133	37
1156		S-0226	LARC CONTINUOUS-FLOW HYP	070	F1156134	MB
1157		S-1225	LARC LOW-TURBULENCE PRES	063	F1157135	MG
1158	120,002	S-0605	GAC 36-IN HYPERSONIC	020	F1158136	CX
1159	119,988	S-0604	GAC 36-IN HYPERSONIC	019	F1159137	CT
1160	120,003	S-0617	MSFC 14-IN TRISONIC	496	DIGITIZED DATA	NOT AVAIL
1161	119,989	S-0607	GAC 26-IN TRANSONIC	035	F1161138	CR
1162	120,004	S-0249	MSFC 14-IN TRISONIC	497	F1162139	39
1163	119,990	S-0609	GAC 15-IN SUPERSONIC	022	F1163140	CS
1164	120,005	S-1010	NSRDC 7X10-FT TRANSONIC	3210	F1164141	N3
1165		H-0211	LARC MACH 8 VAR-DEN HYP	RLM	DIGITIZED DATA	NOT AVAIL
1166	119,991	S-1040	MSFC 14-IN TRISONIC	501	F1166142	43
1167	120,006	S-0615	GAC 7X10-FT SUBSONIC	292	DIGITIZED DATA	NOT AVAIL
1168		S-1228	LARC LOW-TURBULENCE PRES	065	F1168143	M5
1169		S-0803	LARC LOW-TURBULENCE PRES	069	F1169144	MI
1170	120,007	H-0404	CAL 96-IN HYPER SHOCK	MDAC	NO DIGITIZED DATA	INPUT

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1171		S-0437	LARC 8-FT TRANSONIC	PRES 438	F1171145	MJ
1172		S-1229	LARC LOW-TURBULENCE	PRES 071	F1172146	ML
1173		S-1227	LARC UNITARY PLAN	942	F1173147	MK
1174	120,008V1 120,061V2 120,062V3 120,063V4 120,064V5 120,065V6	P-1002	AEDC A / SUPERSONIC	1163	P1174002	T8
1175		S-1226	LARC 4X4-FT SUPERSONIC	432	F1175148	LY
1176		S-1237	LARC 22-IN HELIUM	7386/ 7390	DIGITIZED DATA NOT AVAIL	
1177	120,009V1 119,987V2 120,029V3	H-1009 H-1029 H-1022	AEDC B / HYPERSONIC	1162-1 1162-2 1162-3	NO DIGITIZED DATA INPUT	
1178		H-0603	LARC CONTINUOUS-FLOW	HYP 069	NO DIGITIZED DATA INPUT	
1179	TM-X62058	H-0206	ARC 3.5-FT HYPERSONIC	105	NO DIGITIZED DATA INPUT	
1180	TM-X62057	H-0207	ARC 3.5-FT HYPERSONIC	106	NO DIGITIZED DATA INPUT	
1181	120,010	S-1042	MSFC 14-IN TRISONIC	504	F1181149	46
1182	120,011	S-1044	MSFC 14-IN TRISONIC	505	F1182150	47
1183	120,012	S-0618	MSFC 14-IN TRISONIC	506	F1183151	48
1184	120,013	S-1236	MSFC 14-IN TRISONIC	507	F1184152	49
1185	120,014	S-0050	MSFC 14-IN TRISONIC	509	F1185153	51
1186	120,015	S-0065	MSFC 14-IN TRISONIC	510	F1186154	52
1187	120,016	S-1043	MSFC 14-IN TRISONIC	502	F1187155	44
1188	120,017	S-1041	MSFC 14-IN TRISONIC	503	F1188156	45
1189		S-1230	LARC LOW-TURBULENCE	PRES 075	F1189157	MN(L)
1190		S-1238	LARC 22-IN HELIUM	7377- 7379/ 7380- 7390	F1190158	MU
1191	120,018	S-0619	TBC TRANSONIC	1265	F1191159	D2
1192	120,019	S-1036	NSRDC 7X10-FT TRANSONIC	3310	DIGITIZED DATA NOT AVAIL	
1193		S-1239	LARC LOW-TURBULENCE	PRES 073	F1193160	MV
1194		S-1231	LARC CONTINUOUS-FLOW	HYP 076	F1194161	MQ
1195		S-1232	LARC 8-FT TRANSONIC	PRES 604	F1195162	MN(T)
1196		S-1233	LARC UNITARY PLAN	964	F1196163	MN(U)
1197		S-1240	LARC UNITARY PLAN	962	F1197164	MW
1198		S-1242	LARC CONT-FLOW HYPERSONIC	074	F1198165	MY
1199		S-1241	LARC 4X4-FT SUPERSONIC	430	F1199166	MX
1200		S-1243	LARC 8-FT TRANSONIC	PRES 605	F1200167	MZ
1201	120,020	S-1026	MSFC 14-IN TRISONIC	498	F1201168	41
1202	TM-X62112	S-0054	ARC 6X6-FT SUPERSONIC	505	F1202169	BE
1203	R-01	S-1234	LARC 20-IN HYPERSONIC	6392	F1203170	MR
1204	120,022	S-0250	MSFC 14-IN TRISONIC	512	F1204171	50
1205	120,023	S-0008	TAM 7X10-FT SUBSONIC	S-8	F1205172	G9
1206	120,024V1	H-1008	AEDC A / SUPERSONIC	F00	NO DIGITIZED DATA INPUT	
1207	120,025V1 120,043V2	H-1009 H-1014	AEDC B / HYPERSONIC	1162-4 1162-12	NO DIGITIZED DATA INPUT	
1208	120,026	S-1046	MSFC 14-IN TRISONIC	518	F1208173	54
1209	120,027	S-0621	MSFC 14-IN TRISONIC	513	F1209174	53
1210	120,028	S-0251	MSFC 14-IN TRISONIC	514	F1210175	58
1211		S-1235	LARC 22-IN HELIUM	7379	F1211176	MS

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1212	120,030	S-1037	CAL 8-FT TRANSONIC	063	F1212177	U9
1213	120,031	S-0440	MSFC 14-IN TRISONIC	517	F1213178	56
1214		S-0627	LARC 20-IN HYPERSONIC	6397	F1214179	04
1215		S-0051	LARC LOW-TURBULENCE PRES	085	F1215180	01
1216		S-1233	LARC UNITARY PLAN	964/ 969	F1216181	M0
1217	CANCEL		MSC	S-52	NO DIGITIZED DATA INPUT	
1218		S-1244	LARC 22-IN HELIUM	7398	F1218182	06
1219		S-0056	LARC CONTINUOUS-FLOW HYP	080	F1219183	05
1220		S-0628	LARC 20-IN HYPERSONIC	6398	F1220184	02
1221	120,033	S-0055	JPL 20-IN SUPERSONIC	681	F1221185	GB
1222	120,034V1	P-1001	AEDC 16-FT PWT	174/ 1154	P1222003	TC
1223	120,035	S-0252	GDC 8X12-FT SUBSONIC	603	F1223186	D6
1224	120,036V1	H-1030	AEDC F / HYPERSONIC	1162-F0	NO DIGITIZED DATA INPUT	
	120,045V2	H-1031				
1225	120,037V1	P-1006	AEDC B / HYPERSONIC	1162-7	NO DIGITIZED DATA INPUT	
	120,046V2	P-1007				
	120,047V3	P-1008				
1226	120,038	S-1047	MSFC 14-IN TRISONIC	521	F1226187	55
1227	120,039	S-0625	MSFC 14-IN TRISONIC	523	F1227188	57
1228	120,069	S-0622	TBC TRANSONIC	553	F1228189	D4
		S-0623	TBC 4-FT SUPERSONIC			
1229		S-1245	LARC LOW-TURBULENCE PRES	072	F1229190	07
1230	120,083V1	S-0222	MDAC 4-FT TRISONIC	222	F1230191	D7
	120,084V2	S-0441				
	120,085V3					
	120,086V4					
	120,087V5					
1231	120,048V1	H-1028	AEDC B / HYPERSONIC	1162	NO DIGITIZED DATA INPUT	
1232		S-1246	LARC UNITARY PLAN	968/ 077	F1232192	09
1233		S-1247	LARC LOW-TURBULENCE PRES	087	F1233193	0A
1234		H-0605	LARC MACH 8 VAR-DEN HYP	546	NO DIGITIZED DATA INPUT	
1235		S-1249	LARC UNITARY PLAN	970	F1235194	0C
1236		H-0216	LARC MACH 6 HIGH RN	489	NO DIGITIZED DATA INPUT	
1237		S-1248	LARC UNITARY PLAN	966	F1237195	0B
1238		H-1032	LARC 20-IN HYPERSONIC	6386/ 6387	DIGITIZED DATA NOT AVAIL	
1239		S-1250	LARC LOW-TURBULENCE PRES	086/ 088	DIGITIZED DATA NOT AVAIL	
1240	120,040	S-1049	MSFC 14-IN TRISONIC	524	F1240196	59
1241	120,041	S-0076	MSFC 14-IN TRISONIC	531	F1241197	60
1242	120,042	S-1048	MSFC 14-IN TRISONIC	526	F1242198	61
1243	120,050	S-0067	MSFC 14-IN TRISONIC	528	F1243199	62
1244		H-0217	LARC 20-IN HYPERSONIC	1-20	NO DIGITIZED DATA INPUT	
1245	120,051	S-1052	MSFC 14-IN TRISONIC	529	F1245200	63
1246	CANCEL	H-0218	LARC CONTINUOUS-FLOW HYP	083	NO DIGITIZED DATA INPUT	
1247	120,052	S-1053	MSFC 14-IN TRISONIC	533	REDESIGNATED TO PHASE C	
1248	CANCEL		TAM	B1215	NO DIGITIZED DATA INPUT	
1249	120,053	S-1054	MSFC 14-IN TRISONIC	534	F1249201	65
1250		S-0066	ARC 11-FT TRANSONIC	628	F1250202	BF
1251	120,055	S-1058	MSFC 14-IN TRISONIC	538	F1251203	66
1252	TM-X62114	H-1601	ARC 3.5-FT HYPERSONIC	131	NO DIGITIZED DATA INPUT	

**TABLE 2. PHASE A/B SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONCLUDED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
1253	120,056	S-1059	MSFC 14-IN TRISONIC	541	F1253204	68
1254	120,057	S-1060	MSFC 14-IN TRISONIC	542	F1254205	69
1255	120,058	P-1009	MSFC 14-IN TRISONIC	543	DIGITIZED DATA NOT AVAIL	
1256	120,059	S-1055	MSFC 14-IN TRISONIC	544	F1256206	71
1257			MSFC 14-IN TRISONIC	545	TEST REDESIGNATED TO PHASE C	
1258		S-1251	LARC UNITARY PLAN	979	F1258207	0F
1259	120,066	P-1010	MSFC 14-IN TRISONIC	540	P1259004	67
1260		H-1033	LARC MACH VAR-DEN HYP	078	DIGITIZED DATA NOT AVAIL	
1261		H-0606	LARC MACH 8 VAR-DEN HYP	R08	NO DIGITIZED DATA INPUT	
1262	120,067V1	H-1011	AEDC B / HYPERSONIC	1162-9	NO DIGITIZED DATA INPUT	
	120,068V2	H-1013				
		H-1017				
1263		H-1034	LARC UNITARY PLAN	967	P1263005	0L
1264	120,049V1	H-1010	AEDC B / HYPERSONIC	1162-11	NO DIGITIZED DATA INPUT	
	120,071V2	H-1015				
		H-1028				
1265		S-1254	LARC UNITARY PLAN	981	F1265208	0H
1266	120,072	H-0019	AEDC B / HYPERSONIC	288	NO DIGITIZED DATA INPUT	
1267		S-0079	ARC 11-FT TRANSONIC	629	F1267209	BG
		S-0080	9X7-FT SUPERSONIC			
1268		S-1252	LARC LOW-TURBULENCE PRES	103	F1268210	0M
1269	CANCEL	S-1255	LARC CONT-FLOW HYP	084	DIGITIZED DATA NOT AVAIL	
1270		S-1253	LARC 22-IN HELIUM	405	F1270211	0N
	V1					
	V2					
1271	CANCEL		MSFC 14TWT	552	NO DIGITIZED DATA INPUT	
1272	120,074	S-1055	MSFC 14-IN TRISONIC	544X	F1272212	71
1273	120,075	P-1011	MSFC 14-IN TRISONIC	550	DIGITIZED DATA NOT AVAIL	
1274	120,076	S-1062	MSFC 14-IN TRISONIC	551	F1274213	74
1275	120,073	S-0629	TBC TRANSONIC	557	F1275214	D8
		S-0630	TBC 4-FT SUPERSONIC			
1276	120,078	S-0629	TBC TRANSONIC	557	F1276215	D9
		S-0630	TBC 4-FT SUPERSONIC			
1277		S-1256	LARC CONTINUOUS-FLOW HYP	085	DIGITIZED DATA NOT AVAIL	
1278		H-1035	LARC MACH 8 VAR-DEN HYP	1035	NO DIGITIZED DATA INPUT	



**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2001	128,750	MA5	LARC UNITARY PLAN	1002	F2001001	OQ
2002	128,752	LA1	LARC 8-FT TRANSONIC	626	F2002002	OU
2003	128,754	MA2	LARC 22-IN HELIUM	409	F2003003	OS
2004	120,082	MA1	LTV 15X20-FT LOW SPEED	407	F2004004	DD
2005	120,070	OA1	MSFC 14-IN TRANSONIC	555	F2005005	76
2006	120,088	IA1A	MSFC 14-IN TRANSONIC	556	F2006006	77
2007	128,760	OA4	ARC 3.5-FT HYPERSONIC	147	F2007007	BI
2008	128,751	MA4	LARC 31-IN CONT-FLOW HYP	089	F2008008	OT
2009	128,761	OA3	ARC 6X6-FT SUPERSONIC	650	F2009009	BH
2010	120,060	IA1B	MSFC 14-IN TRANSONIC	545	F2010010	72
2011	120,089	MA9F	MSFC 14-IN TRANSONIC	558	F2011011	78
2012	120,090	SA1F	MSFC 14-IN TRANSONIC	554	F2012012	79
2013	128,762	IA2	ARC 9X7-FT SUPERSONIC	616	F2013013	BJ
2014	128,753	OA7	LARC UNITARY PLAN	1007	F2014014	OV
2015	120,091V1	IA4	LTV 4X4-FT SUPERSONIC	458	F2015015	DE
	120,091V2					
2016	120,092	OA2	RI 7X11-FT LOW SPEED	689	F2016016	DF
2017	123,851	OA5	RI 7X11-FT LOW SPEED	690	F2017017	DG
2018	128,755	IA3	RI 7X11-FT LOW SPEED	693	F2018018	DH
2019	128,756	OA6	RI 7X11-FT LOW SPEED	694	F2019019	DI
2020	128,757	OA9	RI 7X11-FT LOW SPEED	696	DIGITAL DATA NOT AVAIL	
2021	128,758V1	OA45	RI 7X11-FT LOW SPEED	699	F2021020	DL
	128,758V2				P2021001	DL
2022	128,759	OA10	RI 7X11-FT LOW SPEED	698	F2022021	DK
2023	128,763	LA2	LARC 22-IN HELIUM	411	F2023022	OY
2024	128,766	IA7	ARC 11-FT TRANSONIC	686	F2024023	BL
					P2024002	BL
2025	128,767	SA3F	MSFC 14-IN TRANSONIC	565	F2025024	80
2026	128,778	IA31F	MSFC 14-IN TRANSONIC	566	F2026025	81
2027	141,807V1	IA32FB	MSFC 14-IN TRANSONIC	567	P2027003	82
	141,808V2				NO FORCE DATA	
	141,809V3					
2028	134,434V1	IA31FB	MSFC 14-IN TRANSONIC	570	F2028026	83
	134,436V2					
2029	128,765	OA47	MSFC 14-IN TRANSONIC	568	F2029027	84
2030	128,768	OA14	RI 7X11-FT LOW SPEED	700	F2030028	DM
					F2030029	DM
2031	128,769	LA3	LARC 31-IN CONT-FLOW HYP	085	F2031030	OZ
2032	128,794V1	IA9A/	ARC 11-FT TRANSONIC	707	F2032031	BM
	128,794V2	IA9B/	ARC 8X7-FT SUPERSONIC		F2032032	BN
	128,794V3	IA9C	ARC 9X7-FT SUPERSONIC		F2032033	BP
	128,794V4	OA12A/			F2032034	BQ
	128,794V5	OA12C			P2032004	BM
	128,794V6				P2032005	BM
	128,794V7				P2032006	BN
	128,794V8				P2032007	BO
	128,794V9				P2032008	BP
	128,794V10				P2032009	BQ
	128,794V11					
	128,794V12					
	128,794V13					
	128,794V14					
	128,794V15					
	128,794V16					
	128,794V17					
	128,794V18					

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2033	128,772	LA4C	LARC UNITARY PLAN	995/ 1014	DIGITAL DATA NOT AVAIL	
2034	128,764	LA22	LARC 22-IN HELIUM	405	DIGITAL DATA NOT AVAIL	
2035	134,077	OH2A/B	ARC 3.5 FT HYPERSONIC	158	NO DIGITIZED DATA INPUT	
2036	128,775	LA5	LARC 22-IN HYPERSONIC	413	F2036035	P2/OY
2037	134,405	OA84	LTV 4X4-FT SUPERSONIC	488	F2037036	FO
2038	128,793	OA16	RI 7X11-FT LOW SPEED	701	F2038037	DN
2039	134,071	IA6A	MSFC 14-IN TRANSONIC	571	F2039038	85
2040	128,773	LA6	LARC 8-FT TRANSONIC	643	F2040039	P4
2041	128,781	LA7A	LARC 8-FT TRANSONIC	644	F2041040	P5
2042	134,087	IA52	MSFC 14-IN TRANSONIC	584	NO DIGITIZED DATA INPUT	
2043	128,770	LA16	LARC MACH 8 VARIABLE DEN	624	NO DIGITIZED DATA INPUT	
2044	128,786	OA11A	ARC 3.5-FT HYPERSONIC	157	F2044041	BS
2045	128,779	OA18	RI 7X11-FT LOW SPEED	704	F2045042	DO
2046	128,776	LA17	LARC 8-FT TRANSONIC	648	F2046043	PC
2047	134,086	LA31	LARC 31-IN CONT-FLOW HYP	098	NO DIGITIZED DATA INPUT	
2048	134,104	IA12B	ARC 9X7-FT SUPERSONIC	710	F2048044	BV
					P2048010	BV
2049	128,771	OH40	LARC MACH 8 VARIABLE DEN	3619/ 3670	NO DIGITIZED DATA INPUT	
2050	127,790	OA43	ARC 6X6-FT SUPERSONIC	706	F2050045	BT
2051	128,774	SA5F	MSFC 14-IN TRANSONIC	572	F2051046	86
2052	128,791	LA10	LARC UNITARY PLAN	1015	F2052047	P8
2053	128,792V1 V2	OA21B	RI 7X11-FT LOW SPEED	705	F2053048	DP
					F2053049	DP
2054	128,796	LA8A/B	LARC UNITARY PLAN	1023/ 1034	F2054050	P6
2055	128,780V1 128,780V2 128,780V3	OA48	MSFC 14-IN TRANSONIC	574	F2055051	87
2056	128,782	LA9	LARC LOW TURBULANCE PRES	130/ 135	F2056052	P7
2057	134,411	OA44	LARC UNITARY PLAN	1035	F2057053	PN
2058	134,079	OA17	LARC LOW TURBULANCE PRES	138	F2058054	PP
2059	128,798	OA11B	ARC 3.5-FT HYPERSONIC	160	F2059055	BX
2060	134,091	OA58	ARC 3.5-FT HYPERSONIC	163	F2060056	BY
2061	128,789	OA68	RI 7-FT TRISONIC	276	F2061057	DR
2062	134,117V1 134,118V2 141,801V3	IA13	AEDC A/ SUPERSONIC	323	F2062058	TJ
2063	128,788	IA37/ IA48	MSFC 14-IN TRANSONIC	579/ 580	F2063059	88/ 89
2064	141,814V1 141,816V2	IA36	CALSPAN 8-FT TRANSONIC	053	F2064060	UF
					P2064	UF
2065	141,518V1 141,519V2 141,520V3	IA12C	ARC 8X7-FT SUPERSONIC	710	F2065061	BZ
					P2065012	BZ
2066	128,783	LA11	LARC 31-IN CONT-FLOW HYP	096	F2066062	PD
2067	128,777	OS2	LARC 26-IN TRANSONIC	544	NO DIGITIZED DATA INPUT	
2068	128,797	OA71A	RI 7X11-FT LOW SPEED	708	F2068063	DS
2069	134,074	MA7	LARC UNITARY PLAN	1031	F2069064	PM
2070	128,787	LA23	LARC LOW TURBULANCE PRES	141	F2070065	PU
2071	128,799	OA23	ARC 3.5-FT HYPERSONIC	168	F2071066	B6
2072	134,072	IA31FC	MSFC 14-IN TRANSONIC	573	F2072067	90
2073	134,070	OA70	LARC UNITARY PLAN	1043	F2073068	PV

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2074	134,414	OA57A	RI 7X11-FT LOW SPEED	709	F2074069	DT
2075	128,784	OH41	LARC MACH 8 VARIABLE DEN	3778/ 3855	NO DIGITIZED DATA	INPUT
2076	128,785	OH41A	LARC MACH 8 VARIABLE DEN	4060/ 4079	NO DIGITIZED DATA	INPUT
2077	134,095V1 134,099V2 134,100V3	IA29/ OA63	ARC 6X6-FT SUPERSONIC	630	P2077014 NO FORCE DATA	EC/EB
2078	128,795	IA10	ARC 3.5-FT HYPERSONIC	169	F2078070	B7
2079	134,083	LA15	LARC 20-IN HYPERSONIC	6441	F2079071	PH
2080	134,416V1 134,417V2	OA57B	RI 7X11-FT LOW SPEED	713	F2080072 P2028015	DV DV
2081	141,580V1 141,581V2	OA69	RI 7X11-FT LOW SPEED	711	F2081073 P2081016	DQ DQ
2082	128,800	OA73	ARC 3.5-FT HYPERSONIC	167	F2082074	B5
2083	134,081	OA20A	LARC UNITARY PLAN	1057	F2083075	Q2
2084	134,443V1 134,444V2 143,445V3 143,446V4 143,447V5 143,448V6 143,449V7 143,450V8 143,501V9 143,502V10 143,503V11	IA14A	ARC 11-FT TRANSONIC	716	F2084076 P2084018 P2084019 P2084020 P2084021	B1 B1 B1 B1 B1
2085	167,344	OH10/ IH2	ARC 3.5-FT HYPERSONIC	171	P2085022 NO FORCE DATA	B9/EA
2086	134,078	OA71C	RI 7X11-FT LOW SPEED	712	F2086077	DU
2087	134,116	SA10F	MSFC 14-IN TRANSONIC	578	F2087078	91
2088	134,105	SA2FA/B	LARC 8-FT TRANSONIC PRES	655/ 662	F2088079	PS
2089	134,082	OA25	LARC 8-FT TRANSONIC PRES	661	F2089080	Q1
2090	134,080	LA8C	LARC UNITARY PLAN	1040	F2090081	P6
2091	141,512	LA7B	LARC 8-FT TRANSONIC	657/ 660	F2091082	P5
2092	TM-X71968	OA72	LARC 22-IN HELIUM	425	F2092083	PT
2093	134,090	IA37B	MSFC 14-IN TRANSONIC	585	F2092084	93
2094	134,073	OS1	LARC 26-IN TRANSONIC BD	545	NO DIGITIZED DATA	INPUT
2095	134,404	OA49	MSFC 14-IN TRANSONIC	581	F2095085	92
2096	134,101	OH13	LARC MACH 8 VARIABLE DEN	644	P2096023	PO
2097	134,102	OA62A	RI 7X11-FT LOW SPEED	715	F2097086	DW
2098	134,096	IH15	ARC 3.5-FT HYPERSONIC	172	P2098024	B8
2099	134,419V1 134,438V2 134,439V3	OH4B	AEDC B / HYPERSONIC	352	P2099025 NO FORCE DATA	TK
2100	134,075	OH3A/B	AEDC B / HYPERSONIC	289	NO DIGITIZED DATA	INPUT
2101	134,076	OH42A/ OH42B/ OH42C	LARC MACH 8 VARIABLE DEN	4080/ 4105/ 4130/ 4193/ 4270/ 4295	NO DIGITIZED DATA	INPUT

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2102	134,089	IA15	ARC 3.5-FT HYPERSONIC	175	F2102087	EG
2103	134,094	IA62F	MSFC 14-IN TRANSONIC	589	F2103088	94
2104	134,112V1	OA62B	RI 7X11-FT LOW SPEED	717	F2104089	DZ
	134,113V2					
2105	144,594	IH17	LARC MACH 8 VARIABLE DEN	646/ 647	P2105026 P2105027	PR PR
2106	TM-X72630	LA14A/ LA14B	LARC UNITARY PLAN	1046/ 1049	F2106090	PG
2107	TM-X72631	LA20	LARC 8-FT TRANSONIC PRES	653	F2107091	PK
2108	134,084	IA35/ OA64	LARC UNITARY PLAN	1063	P2108028	Q4/Q5
					NO FORCE DATA	
2109	141,527	OH45	LARC 20-IN FREON	121- 137	P2109029	QS
					NO FORCE DATA	
2110	144,589	IH18	LARC 20-IN FREON	118	P2110030	QM
2111	134,435	SA26F	MSFC 14-IN TRANSONIC	590/ 595	F2111092	95
2112	134,401	IA57	AEDC A / SUPERSONIC	422	F2112093	TL
2113	134,111	OA85	LARC 31-IN CONT-FLOW HYP	101	F2113094	QI
2114	134,098	OA86	RI 7X11-FT LOW SPEED	716	F2114095	DX
2115	134,085	OA87	ARC 3.5 FT HYPERSONIC	176	F2115096	EF
2116	134,888	OA91	RI 7-FT TRISONIC	278	F2116097	DY
2117	147,617	OH14	LARC MACH 8 VARIABLE DEN	648	P2117031	QL
2118	134,108	IA41	LARC 8-FT TRANSONIC PRES	667	F2118098	Q8/Q6
2119	134,109	IA42A/ IA42B	LARC UNITARY PLAN	1056/ 1073	F2119099	Q6/ Q8
2120	134,426	OA106	LARC 8-FT TRANSONIC PRES	668	F2120100	QZ
2121	CANCEL	LA38A	LARC 8-FT TRANSONIC PRES	669	F2121101	QX
2122	134,424	IA69	RI 7-FT TRISONIC	280	P2122032	F3
					FORCE DATA NOT AVAIL	
2123	141,504	IA53	MSFC 14-IN TRANSONIC	588	F2123102	96
					P2123033	96
2124	134,093	IA16/ OA26	ARC 3.5-FT HYPERSONIC	180	P2124034	EM
					NO FORCE DATA	
2125	134,409	OA88	LARC 22-IN HELIUM	7422	F2125103	QC
2126	CANCEL	LA25	LARC 31-IN CONT-FLOW HYP	100	F2126104	PX
2127	TM-X71954	LA35	LARC 31-IN CONT-FLOW HYP	102	DIGITAL DATA NOT AVAIL	
2128	134,114V1	OA53A	ARC 11-FT TRANSONIC	747	F2128105	EJ
	134,115V2					
2129	141,522V1	IA14B	ARC 9X7-FT SUPERSONIC	716	F2129106	B3
	141,523V2				P2129035	B3
					P2129036	B3
2130	141,529	OA22A	ARC 11-FT TRANSONIC	716	F2130107	B2
					P2130037	B2
					P2130038	B2
2131	141,530	OA22B	ARC 9X7-FT SUPERSONIC	716	F2131108	B4
					P2131039	B4
					P2131040	B4
2132	141,535	LA42	AEDC B / HYPERSONIC	48A	F2132109	TP
2133	134,110	IA58	LARC 31-IN CONT-FLOW HYP	107	F2133110	QK
2134	134,429	OA77/ OA78	AEDC C / HYPERSONIC	474	F2134111	TN
2135	CANCEL	LA13	LARC 31-IN CONT-FLOW HYP	099	DIGITAL DATA NOT AVAIL	
2136	141,514V1	IH3	ARC 3.5-FT HYPERSONIC	178	P2136041	EI
	141,515V2				NO FORCE DATA	
	141,516V3					
	141,517V4					

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2137	134,103V1	IA60/	LARC 31-IN CONT-FLOW HYP	108/	F2137112	H1
	134,106V2	OA105		109	F2137113	H2/QI
2138	144,608V1	IH4	LARC UNITARY PLAN	1059	P2138042	Q3
	144,609V2					
	144,610V3					
	144,611V4					
2139	134,407	OA118	RI 7X11-FT LOW SPEED	724	F2139114	F6
2140	134,408	OA37	RI 7X11-FT LOW SPEED	719	F2140115	F2
2141	141,538	OH11	AEDC F / HYPERSONIC	354	DIGITAL DATA NOT AVAIL	
2142	134,402	FA4	MSFC 14-IN TRANSONIC	587	F2142116	97
2143	144,587	IA61A	AEDC A / SUPERSONIC	422	F2143117	TQ/TL
2144	134,427	IA68	RI 7-FT TRISONIC	281	F2144118	F4
					P2144043	F4
					F2145119	99
2145	134,420	TA1F	MSFC 14-IN TRANSONIC	583		
2146	134,092	IS4	LARC 26-IN TRANSONIC BD	547	NO DIGITIZED DATA INPUT	
2147	134,097	OA20C	LARC UNITARY PLAN	1057	F2147120	Q2
2148	134,440V1	IH20	ARC 3.5-FT HYPERSONIC	185	P2148044	EN
	134,441V2					
2149	141,805	OA90	LARC 31-IN CONT-FLOW HYP	110	F2149121	QJ
2150	141,511	SA25F	LARC UNITARY PLAN	1087	F2150122	H9
2151	141,815	OH6	ARC 3.5-FT HYPERSONIC	183	DIGITAL DATA NOT AVAIL	
2152	134,423	OA81	AEDC F / HYPERSONIC	489	F2152123	TO
2153	151,377	IH1	LARC UNITARY PLAN	1071	P2153045	Q7
					NO FORCE DATA	
2154	134,437	OH4A	AEDC B / HYPERSONIC	352	NO DIGITIZED DATA INPUT	
2155	134,406	OA110	RI 7X11-FT LOW SPEED	721	F2155124	F5
2156	141,797V1	IA17A	AEDC B / HYPERSONIC	422	F2156125	TR
	141,798V2					
	141,799V3					
2157	141,822	IH19	LARC HYPERSONIC NITROGEN	028	P2157046	QE
					NO FORCE DATA	
2158	147,640	IS6A	MSFC 14-IN TRANSONIC	582	NO DIGITIZED DATA INPUT	
2159	134,410V1	OA59	ARC 6X6-FT SUPERSONIC	709	F2159126	ER
	134,412V2					
2160	134,413	IA18	ARC 3.5-FT HYPERSONIC	191	F2160127	ES
2161	134,422	SA6F	LERC 10X10-FT SUPERSONIC	035	F2161128	GE
2162	134,430	OA36	ARC 3.5-FT HYPERSONIC	187	F2162129	EP
2163	134,403	OA20B	LARC UNITARY PLAN	1097	F2163130	Q2
2164	141,828V1	OH12/	CALSPAN HYPERSONIC SHOCK	100	P2164047	UG
	141,829V2	IH21			NO FORCE DATA	
	141,830V3					
2165	141,823V1	TA2F	MSFC 14-IN TRANSONIC	596	F2165131	1A
	141,824V2				P2165048	1A
	141,825V3					
	141,826V4					
	141,827V5					
2166	141,534	IH16	LARC UNITARY PLAN	1041	P2166049	PQ
					NO FORCE DATA	
2167	141,550	OA98	ARC 3.5-FT HYPERSONIC	190	F2167132	EQ
2168	TM-X71945	LA32	LARC 31-IN CONT-FLOW HYP	097	NO DIGITIZED DATA INPUT	

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2169	141,836V1 141,837V2 141,838V3 141,839V4 141,840V5 141,841V6 141,842V7	IA81A	ARC 11-FT TRANSONIC	019	F2169133 P2169050	ET ET
2170	141,543V1 141,544V2 141,545V3	IA19A	ARC 11-FT TRANSONIC	014	F2170134 P2170052 P2170053 P2170054 P2170055	EU EU EU EU EU
2171	144,584V1 144,585V2 144,586V3	OH38	ARC 3.5-FT HYPERSONIC	198	P2171056 NO FORCE DATA	EZ
2172	144,415	OA99	LARC 60-FT VACUUM SPHERE	3289	NO DIGITIZED DATA	INPUT
2173	134,107	IA8	ARC 14-FT TRANSONIC	711	NO DIGITIZED DATA	INPUT
2174	141,811V1 141,812V2 141,813V3	IA33	MSFC 14-IN TRANSONIC	594	F2174135	1C
2175	134,431V1 134,432V2 134,433V3	IA70	RI 7-FT TRISONIC	282	F2175136	F7
2176	TM-X72661 VOL. IV	LA40	LARC 22-IN HELIUM	426	P2175057 F2176137	F7 H3
2177	141,510	OA83	ARC 3.5-FT HYPERSONIC	194	P2177058	EW
2178	134,119	OA53B	ARC 9X7-FT SUPERSONIC	747	F2178138	EK
2179	151,378	OS8A	ARC 11-FT TRANSONIC	010	F2179139	EX
2180	147,615V1 147,616V2	OS8B IH28	ARC 9X7-FT SUPERSONIC ARC 3.5-FT HYPERSONIC	195	P2179059 P2180060	EX EV
2181	134,425	TA9F	ARC 3.5-FT HYPERSONIC	196	F2181140	EY
2182	151,062	LA49	LARC UNITARY PLAN	1101	F2182141	HJ
2183	TM-X72661 VOL. II	LA51	LARC 8-FT TRANSONIC PRES	684	F2183142	HV
2184	151,061	LA48	LARC 8-FT TRANSONIC PRES	680	F2184143	HI
2185	134,120	OA53C	ARC 8X7-FT SUPERSONIC	747	F2185144	EL
2186	134,428	OA116	LARC 8-FT TRANSONIC PRES	686	F2186145	HU
2187	134,421	OA119A	RI 7X11-FT LOW SPEED	726	F2187146	F8
2188	UNPUB	LA39	LARC UNITARY PLAN	1075	F2188147	QY
2189	141,506	IA110	ARC 9X7-FT SUPERSONIC	052	F2189148	E1/F7
2190	141,537	OA108	MSFC 14-IN TRANSONIC	599	F2190149	1D
2191	TM-X72661 VOL. I	LA47	LARC 31-IN CONT-FLOW HYP	104	F2191150	HH
2192	141,541V1 141,542V2	IA87	AEDC A / SUPERSONIC	60A	F2192151	TU
2193	151,380	OH26	ARC 3.5-FT HYPERSONIC	199	DIGITAL DATA NOT AVAIL	
2194	141,817V1 141,818V2 141,819V3 141,820V4 141,821V5	IA81B	ARC 9X7-FT SUPERSONIC	019	F2194152 P2194061 P2194062	ET ET ET
2195	134,442	OA82	LARC 31-IN CONT-FLOW HYP	113	F2195153	HL

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISITNG (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2196	141,531	OA79	AEDC B / HYPERSONIC	71A	F2196154	TW
2197	134,418	FH10	AEDC F / HYPERSONIC	291	NO DIGITIZED DATA INPUT	
2198	141,534	OA115	AEDC A / SUPERSONIC	71A	F2198155	TV
2199	TM-X3315	LA43A/ LA43B	LARC UNITARY PLAN	1074/ 1093	DIGITAL DATA NOT AVAIL	
2200	TM-X3336	LA44	LARC 8-FT TRANSONIC PRES	677	DIGITAL DATA NOT AVAIL	
2201	160,854	CA3	UNIV. OF WASH. LOW SPEED	1136	F2201156	GL
2202	141,526	OA123	RI 7X11-FT LOW SPEED	731	F2202157	FA
2203	141,524	OA119B	RI 7X11-FT LOW SPEED	730	F2203158	F9
2204	141,525	IA43	LARC 8-FT TRANSONIC PRES	693	F2204159	HC
2205	141,532	OA109	LARC 22-IN HELIUM	431	F2205160	HE
2206	141,528	IA4A	LARC UNITARY PLAN	1119	F2206161	H8
2207	147,608	SA29F	CALSPAN 32-IN LUDWIEG	033	P2208063	1E
					NO FORCE DATA	
2208	144,590V1	TA3F	MSFC 14-IN TRANSONIC	609	P2208064	1G
	144,591V2				NO FORCE DATA	
2209	141,536	OA124	RI 7X11-FT LOW SPEED	736	F2209162	FB
2210	151,372	IH27	ARC 3.5-FT HYPERSONIC	200	P2210066	E3
					NO FORCE DATA	
2211	141,800V1	CA5	THE BOEING CO. TRANSONIC	1431	F2211163	GM
	141,803V2					
	141,804V3					
2212	147,632V1	IA80	ARC 11-FT TRANSONIC	023	F2212164	E4
	147,633V2				F2212165	E4
	144,634V3				P2213067	E4
	147,635V4				P2212068	E4
					P2212069	E4
2213	UNPUB	LA53A/ LA53B/ LA54	LARC CF4 LARC 22-IN HELIUM LARC 20-IN HYPERSONIC	220-237 306 456	F2213166	HS
2214	141,513	OA89	LARC HYPERSONIC NITROGEN	30/31	F2213167	H0
2215	144,592	LA58	LTV 4X4-FT SUPERSONIC	512	F2214168	QD
2216	141,802	SH12F	LARC UNITARY PLAN	1115	F2215169	HY
2217	141,844V1	CA20	THE BOEING CO. TRANSONIC	1431	P2216070	HA
	141,845V2				F2217170	GN
	141,846V3					
2218	151,367V1	TH1F	AEDC F / HYPERSONIC	25A	P2218071	TY
					P2218072	TY
					NO FORCE DATA	
2219	144,597V1	IA82C	ARC 8X7-FT SUPERSONIC	044	F2219171	E5
	144,598V2				P2219073	E5
					P2219074	E5
					P2219075	E5
					P2219076	E5
2220	TM-X72661	LA52	LARC 20-IN HYPERSONIC	6458	F2220172	HN
	VOL. VIII					
2221	141,548	OA143	RI 7X11-FT LOW SPEED	737	P2221077	FC
					NO FORCE DATA	
2222	147,626V1	OH49B	AEDC B / HYPERSONIC	57A	NO FORCE DATA	
	147,627V2					
2223	141,549	SA8F	MSFC 14-IN TRANSONIC	604	F2223173	1H
2224	147,650	LA56	LARC 8-FT TRANSONIC PRES	699	F2224174	HW
					P2224078	HW
2225	141,505	OH4C	AEDC B / HYPERSONIC	352	NO DIGITIZED DATA INPUT	
2226	141,507	IA61B	AEDC A / SUPERSONIC	21AA	NO DIGITIZED DATA INPUT	

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2227	141,806	IA71	MSFC 14-IN TRANSONIC	610	F2227175	1K
2228	TM-X72661 VOL. IX	LA46A/B	LARC UNITARY PLAN	1092/ 1117	F2228176	HG
2229	141,508	OA102	LARC 8-FT TRANSONIC PRES	687	NO DIGITIZED DATA	INPUT
2230	141,509	IA17B	AEDC B / HYPERSONIC	422	NO DIGITIZED DATA	INPUT
2231	144,601V1 144,602V2	IA82B	ARC 9X7-FT SUPERSONIC	044	F2231177 F2231178 F2231179 F2231180 P2231079 P2231080 P2231081 P2231082	E5/E6 E5/E6 E5/E6 E5/E6 E6 E6 E6 E6
2232	141,521	OA131	MSFC 14-IN TRANSONIC	607	NO DIGITIZED DATA	INPUT
2233	151,068	LA59	LARC 8-FT TRANSONIC PRES	703	F2233181	H2
2234	141,547	OA113	CALSPAN HYPERSONIC SHOCK	220	F2234182	UH
2235	141,810	SA30F	MSFC 14-IN TRANSONIC	611	F2235183	1J
2236	141,835	CA11	UNIV. OF WASH. LOW SPEED	1146	F2236184	GO
2237	UNPUB	OA155	LARC V/STOL	114	F2237185 P2237083 P2237084	J7 J7 J7
2238	141,847	OA93	CALSPAN HYPERSONIC SHOCK	120	F2238186	UI
2239	UNPUB	LA38B	LARC 8-FT TRANSONIC PRES	676	F2239187	QX
2240	151,054	IH41A	AEDC A / SUPERSONIC	A4A	P2240085	V7
2241	160,490V1 160,491V2 160,492V3 160,493V4	OH39	AEDC B / HYPERSONIC	74A	NO FORCE DATA NO FORCE DATA	
2242	141,831V1 144,588V2	IA111	AEDC A / SUPERSONIC	A3A	F2242188	V8
2243	144,583	CA23A	ARC 14-FT TRANSONIC	080	F2243189	E9
2244	151,082	SA28F	MSFC 14-IN TRANSONIC	603	F2244190 P2244086	1I 1I
2245	147,618V1 147,619V2	OA161A/ OA161B/ OA161C	ARC 11-FT TRANSONIC ARC 9X7-FT SUPERSONIC ARC 8X7-FT SUPERSONIC	094	F2245191	E7
2246	144,600	LA65	ARC 12	086	F2246192	NC
2247	141,834	OA160	AEDC F / HYPERSONIC	28A	F2247193	VA
2248	144,599	IH48	ARC 3.5-FT HYPERSONIC	211	P2248087	NB
2249	151,775	IH33	CALSPAN HYPERSONIC SHOCK	131	DIGITAL DATA NOT AVAIL	
2250	141,539	OH43	ARC 3.5-FT HYPERSONIC	182	NO DIGITIZED DATA	INPUT
2251	141,540	OH9	AEDC B / HYPERSONIC	353	NO DIGITIZED DATA	INPUT
2252	141,546	OH25A	AEDC B / HYPERSONIC	83A	NO DIGITIZED DATA	INPUT
2253	144,833	IA125	MSFC 14-IN TRANSONIC	622	F2253194	1N
2254	144,619V1 144,620V2 144,621V3 144,622V4 144,623V5 144,624V6 144,625V7 144,626V8 144,627V9 144,628V10	OA148	ARC 11-FT TRANSONIC	073	F2254195 P2254088 P2254089 P2254090 P2254091	E8 E8 E8 E8 E8



**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
	144,601V11					
	144,602V12					
	144,603V13					
2255	TM-X62444	AA3B	ARC 9X7-FT SUPERSONIC	608	NO DIGITIZED DATA INPUT	
2256	UNPUB	LA68	LARC 22-IN HELIUM	439	F2256196	J8
2257	151,369	LA69	LARC 8-FT TRANSONIC PRES	714	F2257197	J9
2258	151,045V1	IA72	ARC 11-FT TRANSONIC	072	F2258198	NE
	151,046V2				P2258092	NE
	151,047V3					
	151,048V4					
	151,049V5					
	151,050V6					
	151,051V7					
	151,052V8					
	151,053V9					
2259	CANCEL	LA60A	LARC 8-FT TRANSONIC PRES	704	DIGITAL DATA NOT AVAIL	
2260	UNPUB	LA60B/ LA60C	LARC 8-FT TRANSONIC PRES	715/ 716	F2260199	J1/ KB
2261	167,364V1	OA100	ARC 40X80-FT SUBSONIC	462	F2261200	NA
	167,365V2				F2261201	
2262	147,630V1	CA6	THE BOEING CO. TRANSONIC	1472	F2262202	GP
	147,631V2					
2263	144,596	OH74	AEDC B / HYPERSONIC	B8A	P2263093	VB
					NO FORCE DATA	
2264	141,843	LA62	ARC 8-FT TRANSONIC	717	F2264203	J3
2265	141,832	OA159	ARC 12-FT PRESSURE	078	F2265204	NG
2266	144,607	LA67	LTV 4X4-FT SUPERSONIC	552	F2266205	FD
2267	147,604V1	MA22	LARC 31-IN CON-FLOW HYP.	118	F2267206	JA
	147,605V2				F2267207	JA
	147,606V3					
	147,607V4					
2268	151,396V1	CA9/ CA9P	THE BOEING CO. TRANSONIC	1477	F2268208	GQ
	151,397V2				P2268094	GQ
	151,398V3				P2268095	GQ
	151,399V4				P2268096	GQ
	151,400V5				P2268097	GQ
2269	147,624	LA70	CALSPAN 8-FT TRANSONIC	103	F2269209	UK
2270	144,579	LA63A	LARC UNITARY PLAN	1118	F2270210	J4
2271	151,044	LA71A/ LA71B	LARC UNITARY PLAN	1147/ 1132	F2271211	JC/ JR
2272	151,077V1	IA114	AEDC B / HYPERSONIC	C4A	F2272212	VC
	151,078V2					
2273	144,612V1	CA26	LTV 4X4-FT SUPERSONIC	559	F2273213	FE
	144,613V2				F2273214	FE
	144,614V3					
	144,615V4					
	144,616V5					
2274	144,593	FA14	MSFC 14-IN TRANSONIC	600	F2274215	1L
2275	144,603V1	CA23B	ARC 14-FT	120	F2275216	NH
	144,604V2					
2276	151,055	FH13	AEDC A / SUPERSONIC	E1A	P2276098	VD
					P2276099	VD
					NO FORCE DATA	
2277	144,579	SA13F	MSFC 14-IN HYPERSONIC	034	F2277217	1F
2278	CANCEL	LA61	LARC LOW TURBULANCE PRES	219	DIGITAL DATA NOT AVAIL	

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2279	144,606	LA63B	LARC UNITARY PLAN	1151	F2279218	J4
2280	144,582	LA28	LTV 4X4-FT SUPERSONIC	498	NO DIGITIZED DATA	INPUT
2281	147,621	LA66	ARC 12-FT PRESSURE	135	F2281219	NJ
2282	151,407	IH34	LERC 10X10-FT SUPERSONIC	038	DIGITAL DATA NOT AVAIL	
2283	147,649	MA14	LTV 15X20-FT LOW SPEED	422	F2283220	FH
2284	151,035V1	IS2A	ARC 11-FT TRANSONIC	113	F2284221	NK
	151,036V2	IS2B	ARC 9X7-FT SUPERSONIC			
2285	144,595	OH50A	AEDC B / HYPERSONIC	21BA	NO DIGITIZED DATA	INPUT
2286	147,625	OA220	ARC 14-FT TRANSONIC	150	F2286222	NL
					P2286100	NL
2287	167,699	OS13	ARC 9X7-FT SUPERSONIC	166	P2287101	NN
					NO FORCE DATA	
2288	151,384	OH64	LERC SPACE POWER FACIL.	OH64	DATA IS BAD	
2289	147,611V1	OA163A	RI 7X11-FT LOW SPEED	751	F2289223	FF
	147,612V2				P2289102	FF
	147,613V3					
	147,614V4					
2290	147,641V1	CA8	LARC VSTOL	129	F2290224	JF
	147,642V2				F2290225	JF
	147,643V3				F2290226	JF
2291	UNPUB	LA79	NSWC 8-FT	1275	F2291227	JM
2292	TM-X72661	LA36B	LARC LOW TURBULANCE PRES	214	F2292228	JS
	VOL. VII					
2293	151,381	IA40	AEDC A / SUPERSONIC	K1A	F2293229	VQ
2294	160,822V1	OA172	RI 7X11-FT LOW SPEED	752	F2294230	FG
	160,823V2				P2294103	FG
					P2294104	FG
2295	151,069V1	IH41B	AEDC A / SUPERSONIC	A4A	P2295105	VF
	151,070V2				P2295106	VF
	151,071V3				NO FORCE DATA	
	151,072V4					
	151,073V5					
2296	147,609V1	LA81	LARC LOW TURBULANCE PRES	229	P2296107	JP
	147,610V2				NO FORCE DATA	
2297	147,628	LA45A/ LA45B	LARC UNITARY PLAN	1145	F2297231	HB/ JX
2298	151,409	LA73A/B	LARC LOW TURBULANCE PRES	227/ 238	F2298232	JE/ K6
2299	TM-X3497	LA80	LARC 7X10-FT	999	F2299233	JN
2300	147,629	LA61B	LARC LOW TURBULANCE PRES	228	F2300234	JT
2301	144,605	OH54A	AEDC B / HYPERSONIC	82A	NO DIGITIZED DATA	INPUT
2302	167,340V1	OA174	ARC 40X80-FT SUBSONIC	479	F2302235	NO
	167,341V2				P23022108	NO/NP
2303	144,618	OH75	AEDC B / HYPERSONIC	E3A	NO DIGITIZED DATA	INPUT
2304	160,846	OA173	ARC 12-FT PRESSURE	180	F2304236	NS
					P2304109	NS
2305	151,059V1	LA76	LTV 4X4-FT SUPERSONIC	573	F2305237	FI
	151,060V2					
2306	167,354V1	IA135A/	ARC 11-FT TRANSONIC	144	F2306238	NQ
	167,355V2	IA135B/	ARC 9X7-FT SUPERSONIC	144	F2306239	NQ
	167,356V3	IA135C	ARC 8X7-FT SUPERSONIC	144	P2306110	NQ
					P2306111	NQ
					P2306112	NQ
					P2306113	NQ

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DTA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2307	160,840V1 160,841V2	CA14A	THE BOEING CO. TRANSONIC	1496/ 1497	F2307240	GR
2308	147,636	IH5	CALSPAN 32-IN LUDWIEG	I81	NO DIGITIZED DATA	INPUT
2309	147,644	LA72	LARC 8-FT TRANSONIC PRES	740	F2309241	JD
2310	151,083V1 151,084V2	SA14FB	MSFC 14-IN TRANSONIC	640	F2310242	1P
2311	147,620	LA78/	LARC CF4	267-268/ 272-273	P2311114	JL/
		LA87/ LA88	LARC 22-IN HELIUM LARC 20-IN HYPERSONIC	446 6468		J5/ JV
2312	151,075V1 151,076V2	IH47	AEDC A / SUPERSONIC	J3A	NO FORCE DATA P2312115	VI
2313	151,041V1 151,042V2 151,043V3	FH14	ARC 3.5-FT HYPERSONIC	215	NO FORCE DATA P2313116	NT
2314	151,406	OA176	RI 7X11-FT LOW SPEED	754	F2314243 P2314117	FJ FJ
2315	147,623	IA141	RI 7-FT TRISONIC	297	F2315244	FK
2316	147,622	IA137	ARC 14-FT	143	F2316245 P2316118	NY NY
2317	151,787	OH53A	ARC 3.5-FT HYPERSONIC	216	P2317119 P2317120	NV NV
2318	147,646V1 147,647V2	LA75	LARC UNITARY PLAN	1173	NO FORCE DATA F2318246	JH
2319	151,771	IH43	CALSPAN HYPERSONIC SHOCK	189	P2319121 NO FORCE DATA	UM
2320	151,390V1 151,391V2 151,392V3	OA169	AEDC B / HYPERSONIC	D8A	F2320247	VJ
2321	151,410V1 151,411V2	OH69	AEDC B / HYPERSONIC	E9A	DIGITAL DATA NOT AVAIL	
2322	160,847	OA228	RI 7X11-FT LOW SPEED	757	F2322248	FL
2323	151,039	IA94A	LARC UNITARY PLAN	1152	F2323249	JK
2324	151,040	IA94B	LARC UNITARY PLAN	1177	F2323249	JW
2325	147,645	SA14FA	MSFC 14-IN TRANSONIC	620	F2325250	10
2326	151,037V1 151,038V2	IA93	LARC 8-FT TRANSONIC PRES	749	F2323249	JJ
2327	151,079V1 151,080V2 151,981V3	IA22	AEDC B / HYPERSONIC	D9A	F2327251	VK
2328	TN D-8233	LA34	LARC 31-IN CONT-FLOW HYP	105	NO DIGITIZED DATA INPUT F2329252	JU
2329	160,837	OA224	LARC 16-FT TRANSONIC	312		
2330	147,637	OH52	AEDC B / HYPERSONIC	524	NO DIGITIZED DATA INPUT	
2331	160,838V1 160,839V2	SA11FA SA11FB SA11FC	ARC 11-FT TRANSONIC ARC 9X7-FT SUPERSONIC ARC 8X7-FT SUPERSONIC	074	F2331253	NW/ NX/ NU
					P2331122 P2331123 P2331124 P2331125 P2331126 P2331127	NW NX NU NW NX NU
2332	151,373	CA13	ARC 14-FT TRANSONIC	121	F2332254	NZ

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2333	151,374V1 151,375V2 151,376V3	OA175	ARC 11-FT TRANSONIC	187	F2333255	2A
2334	147,648	SA16F	AEDC 4-FT TRANSONIC	E3A	P2333128 F2334256	2A VP
2335	151,783	IA140A/ IA140B	MSFC 14-IN TRANONIC	641/ 646	F2335257 IA140B NOT AVAILABLE	1Q
2336	167,375	LA145	LARC UNITARY PLAN	1345/ 1390	F2336258	7H
2337	151,786	OA236	RI 7X11-FT LOW SPEED	759	F2337259	FM
2338	147,639	CS3	UNIV. OF WASH. LOW SPEED	1170	NO DIGITIZED DATA INPUT	
2339	UNPUB	OS32	ARC 2X2-FT TRANSONIC	167	P2339129	2C
2340	160,501V1 160,502V2	OH98	AEDC B / HYPERSONIC	J7A	NO FORCE DATA P2340130	VS
2341	147,638	CS4/5	THE BOEING CO. TRANSONIC	1490/ 1493	NO DIGITIZED DATA INPUT	
2342	151,074	OH54B	AEDC B / HYPERSONIC	82A	F2342260	VM
2343	160,849	LA85	LARC 22-IN HELIUM	445	P2343131	JY
2344	151,788V1 151,789V2	LA77	ARC 11-FT TRANSONIC	200	NO FORCE DATA F2344261	2B
2345	78195	SA21F	MSFC 14-IN TRANSONIC	645	F2345262	1R
2346	151,385V1 151,386V2 151,387V3	IA142	AEDC A / SUPERSONIC	K1A	F2346263 F2346264	VT VT
2347	160,482	CA15A	UNIV. OF WASH. LOW SPEED	1173	F2347265	GS
2348	160,483	CA15B	UNIV. OF WASH. LOW SPEED	1178	F2347266	GS
2349	151,379	CA17	UNIV. OF WASH. LOW SPEED	1184	F2348267	GT
2350	151,065	OH46	LARC MACH 8 VARIABLE DEN	4502/ 4601	F2349268	GW
2351	160,853	OA238	RI 7X11-FT LOW SPEED	764	NO DIGITIZED DATA INPUT	
2352	151,383	LA91	LARC 8-FT TRANSONIC PRES	758	F2351269 F2351270 F2351271	FN FN FN
2353	160,827	LA89	ARC 11-FT TRANSONIC	213	F2352272	J6
2354	151,401V1 151,402V2 151,403V3 151,404V4	IA143	AEDC A / SUPERSONIC	P8A	F2352273 F2353274 F2354275 F2354276 F2354277	2E VX VX VX VX
2355	151,066	OH49A	AEDC B / HYPERSONIC	525	NO DIGITIZED DATA INPUT	
2356	151,064	OH60	AEDC B / HYPERSONIC	B7A	NO DIGITIZED DATA INPUT	
2357	167,655	IH68	ARC 3.5-FT HYPERSONIC	222	P2357132	2D
2358	151,067	OH50B	AEDC B / HYPERSONIC	58A	NO FORCE DATA NO DIGITIZED DATA INPUT	
2359	151,405	OH66	CALSPAN HYPERSONIC SHOCK	131	F2359278	UO
2360	160,521V1 160,522V2	OA221B/ OA221C	ARC 8X7-FT SUPERSONIC ARC 9X7-FT SUPERSONIC	119	P2359133 F2360279 F2360280 F2360281 F2360282 F2360283	VO 2I 2I 2I 2I 2I
2361	151,370V1 151,371V2	OA163B	RI 7X11-FT LOW SPEED	768	F2361284 P2361134	FP FP

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2362	UNPUB	LA92	LARC 8-FT TRANSONIC PRES	764	F2362285	K1
2363	151,057	OS7	LARC 16-FT TRANSONIC DYN	246	NO DIGITIZED DATA	INPUT
2364	160,527V1	OA145B	ARC 9X7-FT SUPERSONIC	118	F2364286	2G
	160,528V2				P2364135	2G
	160,529V3					
2365	151,056	OS6	LARC 16-FT TRANSONIC DYN	246	NO DIGITIZED DATA	INPUT
2366	151,063	OH25B	AEDC B / HYPERSONIC	83A	NO DIGITIZED DATA	INPUT
2367	151,773	OH57A/ OH57B	AEDC B / HYPERSONIC	K3A	P2367136	4A
					NO FORCE DATA	
2368	151,058	OH51	LARC 31-IN CONT-FLOW HYP	112	NO DIGITIZED DATA	INPUT
2369	167,345	SA31F	MSFC 32-IN LUDWIEG(HI RN)	039	DIGITAL DATA NOT AVAIL	
2370	151,790V1	OA149B/	ARC 8X7-FT SUPERSONIC	115	F2370287	2K
	151,791V2	OA149C	ARC 9X7-FT SUPERSONIC		P2370137	2K
	151,792V3				P2370138	2K
					P2370139	2K
2371	151,408	OH78	JSC VAC. CHAMBER A	56-A	NO DIGITIZED DATA	INPUT
2372	160,843	IH72	AEDC A / SUPERSONIC	R2A	P2372140	VZ
					NO FORCE DATA	
2373	160,821	LA99	LARC 8-FT TRANSONIC PRES	769	F2373288	K9
2374	167,372	LA82/ LA103	CALSPAN 8-FT TRANSONIC	111/ 113	F2374289 F2374290	UN UP
					P2374141	UP
2375	160,530	OA237	ARC 40X80-FT SUBSONIC	500	F2375291	2M
					F2375292	2M
2376	151,779V1	OA149A	ARC 11-FT TRANSONIC	115	F2370287	2K
	151,780V2				P2376142	2K
	151,781V3				P2376143	2K
					P2376144	2K
2377	167,342V1	IA144	ARC 11-FT TRANSONIC	228	F2377293	2N
	167,343V2					
2378	160,820	IA191	ARC 11-FT TRANSONIC	412	F2378294	AA
					P2378145	AA
2379	UNPUB	LA106	LARC 8-FT TRANSONIC PRESS	776	F2379295	KC
2380	151,802V1	OA145A	ARC 11-FT TRANSONIC	118	F2380296	2F
	151,803V2				P2380146	2F
	151,804V3				P2380147	2F
	151,805V4					
	151,806V5					
	151,807V6					
2381	CANCEL	LA107	ARC 12-FT PRESSURE	780	DIGITAL DATA NOT AVAIL	
2382	151,382	OH8/ IA109	MSFC IMPULSE BASE FLOW	027	NO DIGITIZED DATA	INPUT
2383	UNPUB	LA93	LARC 31-IN CONT-FLOW HYP	130	P2383148	K2
					NO FORCE DATA	
2384	151,412V1	IA148	AEDC B / HYPERSONIC	TOA	F2384297	4D
	151,413V2					
2385	151,366	OH15	ARC 3.5-FT HYPERSONIC	173	NO DIGITIZED DATA	INPUT
2386	151,368	OH44	ARC 3.5-FT HYPERSONIC	177	NO DIGITIZED DATA	INPUT
2387	CANCEL	LA104	LARC LOW TURBULENCE PRES	246	DIGITAL DATA NOT AVAIL	
2388	167,676	OH84A	AEDC B / HYPERSONIC	R4A	DIGITAL DATA NOT AVAIL	
2389	160,810V1	OA145C	ARC 8X7-FT SUPERSONIC	118	F2389298	2H
	160,811V2				P2389149	2H
	160,812V3					
2390	160,481	LA101	LARC UNITARY PLAN	1194	F2390299	KD
2391	167,346	IA244	LARC 8-FT TRANSONIC PRES	779	F2391300	KE

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2392	151,389	OA250	RI 7X11-FT LOW SPEED	775	F2392301	FQ
2393	167,679V1	IH51A	ARC 3.5-FT HYPERSONIC	228	P2393150	2O
	167,680V2				P2393151	2O
	167,681V3				NO FORCE DATA	
	167,682V4					
2394	UNPUB	LA109	LTV HYPERSONIC	611	F2394302	FR
2395	151,394	LA111	LARC 8-FT TRANSONIC PRES	786	F2395303	KJ
2396	151,393	LA110	LARC UNITARY PLAN	1212	F2396304	KI
2397	167,347	LA113	LARC 8-FT TRANSONIC PRES	787	F2397305	KH
2398	160,850V1	IA105A	AEDC 16-FT TRANSONIC	470	F2398306	4B
	160,851V2				F2398307	4F/9U
	160,852V3				P2398152	4B
					P2398153	4B
					P2398154	4B
					P2398155	4B
					P2399156	4F
					P2399157	4F
					P2399158	4F
2399	151,388	LA114	LARC UNITARY PLAN	1217	F2399308	KK
2400	160,518	OA234	LERC 10X10-FT SUPERSONIC	042	F2400309	GY/QQ
2401	151,395	IS1A/ IS1B/ IS1C/ OS3	ARC 8X7-FT SUPERSONIC	705	NO DIGITIZED DATA INPUT	
2402	151,763	OA223	RI 7X11-FT LOW SPEED	776	F2402310	FO
2403	160,515V1	IA156A	AEDC 16-FT TRANSONIC	470	F2403311	8N
	160,516V2				F2403312	4C
	160,517V3				F2403313	4C
					P2403159	4C
2404	160,510V1	IA119	ARC 11-FT TRANSONIC	275	F2404314	2R
	160,511V2				P2404160	2R
	160,512V3				P2404161	2R
	160,513V4				P2404162	2R
					P2404163	2R
					P2404164	2R
					P2404165	2R
2405	151,756V1	OA101	ARC 12-FT PRESSURE	218	F2405315	2Q/ WL
	151,757V2					
	151,758V3				P2405166	2Q
	151,759V4				P2405167	2Q
	151,760V5					
	151,761V6					
2406	167,348	IA181	MSFC 14-IN TRANSONIC	649	F2406316	1U
					F2406317	1U
2407	167,374	IH73	ARC 3.5-FT HYPERSONIC	233	P2407168	2V
2408	160,498V1	IA156B	ARC 9X7-FT SUPERSONIC	272	F2408318	2T
	160,499V2				P2408169	2T
	160,500V3					
2409	160,842	LA115	LARC 8-FT TRANSONIC PRES	803	F2409319	KL
2410	151,777	OH56	AEDC B / HYPERSONIC	R3A	P2410170	4G
					NO FORCE DATA	
2411	UNPUB	LA116	LARC 8-FT TRANSONIC PRES	804	F2411320	KM
2412	167,386V1	IH90	ARC 3.5-FT HYPERSONIC	234	P2412171	2W
	167,387V2				P2412172	2W
					P2412173	2W

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2413	160,858V1 160,859V2	IA105B	ARC 9X7-FT SUPERSONIC	242	F2413321 P2413174 P2413175	2U 2U 2U
2414	160,484V1 160,485V2	OA232	AEDC 16-FT TRANSONIC	431	F2414322	VR
2415	151,784V1 151,785V2	OA208/ OA209	AEDC B / HYPERSONIC AEDC A / SUPERSONIC	P5A	F2415323 F2415324 F2415325 F2415326	4I 4I 4J 4J
2416	160,824	IA603	MSFC 14-IN TRANSONIC	668	F2416327	6C
2417	151,770	OH58	ARC 3.5-FT HYPERSONIC	235	P2417176 P2417177	2X 2X
					NO FORCE DATA	
2418	151,414	IH100	ARC 3.5-FT HYPERSONIC	227	NO DIGITIZED DATA INPUT	
2419	151,762	OA270B/ OA270C	LARC 16-FT TRANSONIC	325	F2419328	KO/ KP
2420	167,385	OH103A	AEDC B / HYPERSONIC	V2C	P2420178	4H
					NO FORCE DATA	
2421	160,495V1 160,496V2	OA251B/ OA251C	ARC 9X7-FT SUPERSONIC ARC 8X7-FT SUPERSONIC	282	F2421329 F2421330 F2421331 F2421332 F2422333	2Z 2Z 3B 3B 3B
2422	151,767	FH15	AEDC A / SUPERSONIC	020	P2422179	4K
					NO FORCE DATA	
2423	151,768	FH16	ARC 3.5-FT HYPERSONIC	237	P2423180	3A
					NO FORCE DATA	
2424	160,506V1 160,507V2 160,508V3	OA126A/ OA126B/ OA126C	ARC 11-FT TRANSONIC ARC 9X7-FT SUPERSONIC ARC 8X7-FT SUPERSONIC	289	F2424334 F2424335	2Y 3H
2425	UNPUB	LA117	LARC 8-FT TRANSONIC PRES	813	F2425336	KQ
2426	TP1186	LA124	LARC UNITARY PLAN	1207	NO DIGITIZED DATA INPUT	
2427	167,675	OH103B	AEDC D / HYPERSONIC	V2C	P2427181	4M
					NO FORCE DATA	
2428	160,523V1 160,524V2 160,525V3 160,526V4	IH11	LERC 10X10-FT SUPERSONIC	045	P2428182 P2428183	GI GI
					NO FORCE DATA	
2429	167,353	IH51B	ARC 3.5-FT HYPERSONIC	239	P2429184	3C
					NO FORCE DATA	
2430	160,817V1 160,818V2 160,819V3	OA270A	LARC 16-FT TRANSONIC	326	F2430337 P2430185	KN KN
2431	151,793V1 151,794V2 151,795V3 151,796V4 151,797V5 151,798V6 151,799V7 151,800V8	IH85	AEDC A / SUPERSONIC	W5	P2431186 P2431187 P2431188 P2431189	4L 4L 4L 4L
					NO FORCE DATA	
2432	160,845	LA125	LARC UNITARY PLAN	1243	F2432338	KS
2433	151,764	OA171	NSWC HYPERSONIC LAB ( 9 )	1310	F2433339	GJ
2434	151,782	OA129	AEDC 16-FT TRANSONIC	507	F2434340	4N
2435	151,415	IH39	LERC 10X10-FT SUPERSONIC	041	NO DIGITIZED DATA INPUT	

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2436	TM-X72661	LA126			NO DIGITIZED DATA INPUT	
	VOL. VI					
2437	151,766	FA25	MSFC 14-IN TRANSONIC	652	F2437341	1X
2438	160,855V1	IA138	ARC 9X7-FT SUPERSONIC	246	F2438342	3D
	160,856V2				F2438343	3D
	160,857V3				P2438190	3D
2439	167,673	IA182	AEDC 16-FT TRANSONIC	517	F2439344	4P
2440	151,765	IH83	LERC 10X10-FT SUPERSONIC	044	NO DIGITIZED DATA INPUT	
2441	UNPUB	LA127	LARC TRANSONIC PRESSURE	255	F2441345	KU
2442	UNPUB	LA128	LTV HYPERSONIC	646	DATA NOT AVAILABLE	
2443	151,769	OH79	JSC VAC. CHAMBER A	A-78	NO DIGITIZED DATA INPUT	
2444	160,488V1	IA183	AEDC 16-FT TRANSONIC	519	F2444346	4Q
	160,480V2				F2444347	4Q
2445	167,652V1	OA146	ARC 8X7-FT SUPERSONIC	318	F2445348	3G
	167,653V2				P2445191	3G
2446	UNPUB	LA122	LARC UNITARY PLAN	1270	F2446349	KX
2447	UNPUB	OS52	ARC 11-FT TRANSONIC	436	F2447350	AB
					P2447192	AB
2448	160,519V1	IH51C	ARC 3.5-FT HYPERSONIC	241	P2448193	3F
	160,520V2				P2448194	3I
2449	160,497	IA132	AEDC 16-FT TRANSONIC	505	F2449351	4R
					F2449352	4R
					F2449353	4R
					F2449354	4R
					F2449355	4R
					F2449356	4R
2450	151,774	OS4A/ OS4B/ OS12	ARC 2X2-FT TRANSONIC	041/ 154/ 116	NO DIGITIZED DATA INPUT	
2451	151,772	OH90A/ MA29	AEDC B / HYPERSONIC	P4A/ K7A	NO DIGITIZED DATA INPUT	
2452	167,383	IH99	ARC 3.5-FT HYPERSONIC	230	P2452195	2P
					NO FORCE DATA	
2453	151,776	IH75	CALSPAN 32-IN LUDWIEG	100	NO DIGITIZED DATA INPUT	
2454	TM-X72661	LA57	LARC 31-IN CONT-FLOW HYP	114	NO DIGITIZED DATA INPUT	
	VOL. III					
2455	151,778	OH102A	AEDC B / HYPERSONIC	065	NO DIGITIZED DATA INPUT	
2456	160,486V1	IA184	ARC 9X7-FT SUPERSONIC	347	F2456357	3K
	160,487V2				P2456196	3K
					P2456197	3K
2457	160,813	IA180	LARC UNITRY PLAN	1267	F2457358	KV
					F2457359	KV
2458	167,668	OS36/41 OS37	ARC 11-FT TRANSONIC	369	P2458198	3L
					P2458199	3M
					NO FORCE DATA	
2459	167,685V1	OA310A	AMES 11-FT TRANSONIC	587	P2459200	A2
	167,686V2	OA310B	LEWIS 8X6-FT SUPERSONIC	D046	P2459201	A5
		OA310C	LEWIS 10-FT SUPERSONIC	D074	P2459202	A4
2460	CANCEL	FA27	MSFC 14-IN TRANSONIC	655	F2460360	1Y
2461	167,677	IH51D	ARC 3.5-FT HYPERSONIC	244	P2461203	3N
					P2461204	3N
2462	167,370V1	IA131B/	ARC 9X7-FT SUPERSONIC	283	F2462361	3E
	167,371V2	IA131C	ARC 8X7-FT SUPERSONIC		F2462362	3J
2463	167,672	OS41/ OS42/ OS45	ARC 11-FT TRANSONIC	369/ 380/ 381	P2463205	3O
					P2463206	3S
					NO FORCE DATA	



**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2464	160,828V1 160,829V2 160,830V3 160,831V4 160,832V5 160,833V6	OH84B/ OH105/ IH102	AEDC B / HYPERSONIC AEDC B / HYPERSONIC AEDC A / SUPERSONIC	B67	P2464207 P2464208 P2464209	4V 4U 4W
2465	167,674	OS55/ OS57	ARC 9X7-FT SUPERSONIC	464	P2465210	AJ
2466	167,663V1 167,664V2	OA257	LARC 20-INC HYPERSONIC	6559	F2466363	7E
2467	160,834	IH103	ARC 3.5-FT HYPERSONIC	245	P2467211	3P
2468	167,352	OH84C/ OH105B	ARC 3.5-FT HYPERSONIC	246/ 247	P2468212 P2468213	3Q 3R
2469	167,367	OS301A	ARC 11-FT TRANSONIC	503	NO DIGITIZED DATA INPUT	
2470	167,658	OS31A	ARC 11-FT TRANSONIC	145	NO DIGITIZED DATA INPUT	
2471	160,514	LA132	LARC 16-FT TRANSONIC	341	P2471214	KW
2472	160,494	OH400	AEDC B / HYPERSONIC	065	NO FORCE DATA	
					F2472364	4X
					P2472215	4X
2473	167,388V1 167,389V2	OA252	ARC 2X2-FT TRANSONIC	382	F2473365	3T
					P2473216	3T
2474	160,826	FA28	MSFC 14-IN TRANSONIC	656	F2474366	1Z
2475	160,509	LA140	LARC 16-FT TRANSONIC	342	F2475367	KY
					P2475217	KY
2476	167,690V1 167,691V2	IA190A/ IA190B	ARC 11-FT TRANSONIC ARC 9X7-FT SUPERSONIC	411	F2476368	3U
					F2476369	3U
					F2476370	3U
					F2476371	3V
					F2476372	3V
					F2476373	3V
					F2476374	3V
					F2476375	MP
					P2476218	3U
					P2476219	3V
2477	160,825	LA141A/ LA141B	LARC 20-IN HYPERSONIC	6546	F2477376	KZ
2478	160,503V1 160,504V2 160,505V3	LA131	LARC UNITARY PLAN	1299	F2478377	7A
2479	UNPUB	IA600	MSFC 14-IN TRANSONIC	658	F2479378	6A
					DATA BAD FOR IA600	
2480	167,657	IH104	ARC 11-FT TRANSONIC	250	P2480220	3W
2481	167,377	IA602	MSFC 14-IN TRANSONIC	665	F2481379	6B
2482	160,814V1 160,815V2 160,816V3	OA400	ARC 11-FT TRANSONIC	427	F2482380	3X
					P2482221	3X
					P2482222	3X
2483	167,357V1 167,358V2	OS49	AEDC 16-FT TRANSONIC	556	NO DIGITIZED DATA INPUT	
2484	UNPUB	LA144	LTV 4X4-FT SUPERSONIC	742	F2484381	FS
					F2484382	FS
					F2484383	FS

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2485	167,361	OS50/ OS50A	ARC 11-FT TRANSONIC DATA NOT AVAILABLE	425/ 465	F2485384 F2485385 F2485386 P2485223 P2485224 P2485225	AC AC AC AC AC AC
2486	167,368V1 167,369V2	OA253	AEDC 16-FT TRANSONIC	572	P2486226 P2486227 P2486228	4Y 4Y 4Y
2487	167,362	OS51A/ OS51B/ OS51C/ OS43	ARC 11-FT TRANSONIC	380/ 436	F2487387 F2487388 F2487389 P2487229	AD AF AI AM
2488	160,835	OS300	ARC 2X2-FT TRANSONIC	458	P2488230	AE
2489	167,366	OS56	AEDC 16-FT TRANSONIC	608	NO DIGITIZED DATA	INPUT
2490	167,349V1 167,350V2 167,351V3	OH109	AEDC B / HYPERSONIC	G9	P2490231	4Z
2491	167,659V1 167,660V2 167,661V3 167,662V4	OA258	AEDC B / HYPERSONIC	HO	F2491390	T1
2492	167,359	OH107	AEDC B / HYPERSONIC	017	P2492232	T2
2493	167,665V1 167,666V2	OA259	AEDC B / HYPERSONIC	014	F2493391	T3
2494	167,360	OH108	ARC 3.5-FT HYPERSONIC	254	P2494233	AH
2495	160,844	OH110	ARC 3.5-FT HYPERSONIC	253	P2495234	AG
2496	167,380V1 167,381V2 167,382V3	OH111	AEDC B / HYPERSONIC	1C	P2496235	T6
2497	UNPUB	MA34	AEDC 16-FT TRANSONIC	594	F2497392	T4
2498	167,656	OA255/ OA256 -	LARC UNITARY PLAN NO DIGITIZED DATA INPUT	1358 1311 1319	F2498393 F2498394 F2498395	7B 7B 7B
2499	160,836	OA164	ARC 40X80-FT SUBSONIC	473	NO DIGITIZED DATA	INPUT
2500	160,848	OS301	ARC 22-IN TWT	467	NO DIGITIZED DATA	INPUT
2501	167,373	OS304A	ARC 11-FT TRANSONIC	501	NO DIGITIZED DATA	INPUT
2502	167,378	OS304B	ARC 9X7-FT SUPERSONIC	501	NO DIGITIZED DATA	INPUT
2503	167,363	OS53A/ OS53B	LARC 8-FT TRANSONIC PRES	905 906/ 907/ 909	NO DIGITIZED DATA	INPUT
2504	167,379	OS302B	ARC 9X7-FT SUPERSONIC	503	NO DIGITIZED DATA	INPUT
2505	167,376	OS46A-G	AEDC PWT 16-FT TRANSONIC	551	NO DIGITIZED DATA	INPUT
2506	167,384	OS60/ OS61/ OS62/ OS63	ARC 11-FT TRANSONIC/ ARC 9X7-FT SUPERSONIC	500 507 531	NO DIGITIZED DATA	INPUT
2507	167,683	MA33A/ MA33B	ARC 11-FT TRANSONIC/ ARC 9X7-FT SUPERSONIC	510	F2507396	AU
2508	167,650	OS306A/ OS306B	ARC 11-FT TRANSONIC/ ARC 9X7-FT SUPERSONIC	548	NO DIGITIZED DATA	INPUT
2509	167,654	OA307A/ OA307B	ARC 11-FT TRANSONIC ARC 9X7-FT SUPERSONIC	549	NO DIGITIZED DATA	INPUT

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONTINUED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL	NO.	ARCHIVE FILE NAME	TEST CODE
2510	167,651	OS309A	ARC 11-FT TRANSONIC		548	NO DIGITIZED DATA INPUT	
2511	167,669V1 167,670V2 167,671V3	IA300	ARC 11-FT TRANSONIC		561	F2511397 F2511398 F2511399 P2511236 P2511237 P2511238 P2511239 P2511240 P2511241 P2511242 P2511243 P2511244 P2411245 P2411246	AZ AZ AZ AZ AZ AZ AZ AZ AZ AZ AZ AZ AZ
2512	167,667	OA308A	ARC 22-IN TRANSONIC		542	NO DIGITIZED DATA INPUT	
2513	167,678	OS313	AEDC 16-FT TRANSONIC		645	NO DIGITIZED DATA INPUT	
2514	167,687	FA301	MSFC 14-IN TRANSONIC		692	F2514400	A6
2515	167,684	OS305	ARC 11-FT TRANSONIC		562/ 563/ 564/ 565	NO DIGITIZED DATA INPUT	
2516	167,688	OS311	ARC 11-FT TRANSONIC		562/ 563/ 564/ 565	NO DIGITIZED DATA INPUT	
2517	167,689	OS314A/ OS314B/ OS314C	ARC 9X7-FT SUPERSONIC		582	NO DIGITIZED DATA INPUT	
2518	UNPUB	IA301	MSFC 14-IN TRANSONIC		695	F2518401	D1
2519	167,692	OA309	RI LOW SPEED		838	NO DIGITIZED DATA INPUT	
2520	167,693	IH97A/ IH97B/ IH97C	AEDC A / SUPERSONIC AEDC C / HYPERSONIC		VA1X VC2E	NO DIGITIZED DATA INPUT	
2521	167,694	OS310	ARC 22-IN TRANSONIC		560	NO DIGITIZED DATA INPUT	
2522	UNPUB	OS315	AEDC C / HYPERSONIC		VC3E	NO DIGITIZED DATA INPUT	
2523	UNPUB	LA301	LARC 16-FT TRANSONIC		390	F2523402 F2523247	D6 D6
2524	167,695	IH42	ARC 3.5-FT HYPERSONIC		218	NO DIGITIZED DATA INPUT	
2525	UNPUB	LA302	LARC UNITARY PLAN		1504	P2525248 P2525249	D8 D8
2526	UNPUB	OA350	LARC UNITARY PLAN		1415	F2526403	D9
2527	UNPUB	LA150	LARC UNITARY PLAN		1407	F2527404	C1
2528	UNPUB	LA151	LARC UNITARY PLAN		1490	F2527404	C2
2529	UNPUB	LA152	CALSPAN		014	F2529405	C3
2530	UNPUB	OA352	AEDC B / HYPERSONIC		027	F2530406	C4
2531	UNPUB	MA300	TEXAS A&M LSWT		8426	F2531407	C5
2532	UNPUB	MA301	TEXAS A&M LSWT		8522	F2532408	C6
2533	UNPUB	OA356	TEXAS A&M LSWT		8702	F2533409	C7
2534	UNPUB	OA357	TEXAS A&M LSWT		8710	F2534410	C8
2535	UNPUB	OA358	TEXAS A&M LSWT		8711	F2535411	C9
2536	UNPUB	IA304	MSFC 14-IN TRANSONIC		705	F2536412	CA
2537	UNPUB	OA353A	ARC 11-FT TRANSONIC		076	F2537413	CB
2538	UNPUB	OA353B	ARC 9X7-FT SUPERSONIC		076	F2538414	CC
2539	UNPUB	OA353C	ARC 8X7-FT SUPERSONIC		076	F2539415	CD

**TABLE 3. PHASE C/D SPACE SHUTTLE VEHICLE WIND TUNNEL TESTING  
DATAMAN DIGITAL DATA BASE FILES LISTING (CONCLUDED)**

DMS-DR NO.	NASA CR- NO.	NASA SERIES	FACILITY	WIND TUNNEL NO.	ARCHIVE FILE NAME	TEST CODE
2540	UNPUB	LA306	LTV HSWT - 1ST ENTRY - 2ND ENTRY	1003	F2540416 F2540417	CE CF
2541	167,698	OA362	TEXAS A&M LSWT		NO DIGITIZED DATA INPUT	
2542	UNPUB	LA305	CALSPAN	123	DIGITAL DATA NOT AVAIL	
2543	UNPUB	IA302A/ IA302B	AEDC B / HYPERSONIC	B38	DIGITAL DATA NOT AVAIL	
2544	UNPUB	IA308A	AEDC 16-FT TRANSONIC	757	P2544250 P2544251 P2544252 P2544253 P2544254	CK CK CK CK CK
2545	UNPUB	IA308B	LEWIS 10X10-FT SUPERSON	A088	DIGITAL DATA NOT AVAIL	
2546	UNPUB	OA355	JSC VACUUM CHAMBER A		DIGITAL DATA NOT AVAIL	
2547	167,696V1 167,697V2	IA310	AEDC 16-FT TRANSONIC	783	F2547418 F2547419	CM CM
2548	UNPUB	FA302	MSFC 14-IN TRANSONIC	726	F2548420	CN
2549	185,696V1 185,697V2	IA613A	AEDC 16-FT TRANSONIC	829	F2549421 P2549255 P2549256 P2549257 P2549258 P2549259	CO CO CO CO CO CO
2550	UNPUB	IA613B	ARC 9X7-FT SUPERSONIC	159	F2550422 P2550260 P2550261	CP CP CP

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1001	DELTA WING		1	MSFC BOOSTER (B-005) LOW SPEED STATIC STABILITY AND LANDING INVESTIGATION, HIGH SPEED GRIT STUDY
1002		STRAIGHT WING	1	MSC ORBITER S-3 (12.5K ORBITER) INVESTIGATION OF HYPERSONIC AERODYNAMIC CHARACTERISTICS
1003		DELTA WING	1	MMC PHASE A SPACE SHUTTLE MODIFIED ORBITER -- INVESTIGATION OF STABILITY CHARACTERISTICS AND CONTROL EFFECTIVENESS
1004		STRAIGHT WING	1	NASA/MSC ORBITER (AUG. 1969 REVISED BASELINE) LONGITUDINAL, DIRECTIONAL, AND LATERAL STABILITY AND CONTROL CHARACTERISTICS
1005		DELTA BODY	1	GAC 111 A CONFIGURATION EARTH ORBITING SHUTTLE -- EVALUATION OF LOW SPEED AERODYNAMIC CHARACTERISTICS
1006	UNIQUE CONFIGS.		1	AEDC VON KARMEN TUNNEL C TEST VT0055 SAMSO-GD/CONVAIR T-16 HYPERSONIC STATIC STABILITY AND CONTROL EFFECTIVENESS INVESTIGATION
1007		STRAIGHT WING	1	MSC ORBITER (S-5) (AUGUST 1969 CONFIGURATION) LONGITUDINAL AND LATERAL STABILITY INVESTIGATION
1008		STRAIGHT WING	1	INVESTIGATION OF LONGITUDINAL, LATERAL AND DIRECTIONAL STABILITY CHARACTERISTICS FOR MODEL S-5, NASA/MSC ORBITER SHUTTLE
1009		DELTA WING	1	LONGITUDINAL STATIC STABILITY CHARACTERISTICS OF MARTIN MARIETTA CORPORATION MODIFIED ORBITER TEST 7341-7343
1010		STRAIGHT WING	1	ILRV STRAIGHT WING ORBITER (MODEL 130C) LONGITUDINAL AND LATERAL STATIC STABILITY CHARACTERISTICS DURING CONFIGURATION BUILD-UP - HORIZONTAL TAIL CONTROL EFFECTIVENESS

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

<b>DMS DR#</b> -----	<b>BOOSTER CONFIG. I.D.</b> -----	<b>ORBITER CONFIG. I.D.</b> -----	<b>VOL. NUM.</b> -----	<b>REPORT TITLE</b> -----
1011		STRAIGHT WING	1	LONGITUDINAL AND LATERAL STATIC STABILITY CHARACTERISTICS AND ELEVATOR EFFECTIVENESS FOR MSC ORBITER S-3
1012		STRAIGHT WING	1	MSC SPACE SHUTTLE ORBITER (MOD. MAY 1969 CONFIGURATION) -- EFFECTS OF REYNOLDS NUMBER, BODY CORNER RADIUS, AND MACH NUMBER ON AERODYNAMIC CHARACTERISTICS
1013		DELTA WING	1	INVESTIGATION OF SUBSONIC AERODYNAMIC CHARACTERISTICS OF MODIFIED SEPTEMBER 1969 BASELINE MARTIN ORBITER CONFIGURATION FR5-2A
1014	DELTA WING		1	MCDAC DELTA WING BOOSTER -- DETERMINATION OF LOW SPEED DIRECTIONAL STABILITY CHARACTERISTICS
1015	UNIQUE CONFIGS.		1	TWIN BODY BOOSTER - TEST NO. 47 -- INVESTIGATION OF SUBSONIC LONGITUDINAL STABILITY AND PERFORMANCE CHARACTERISTICS
1016	DELTA WING	STRAIGHT WING	1	INTERFERENCE FLOW FIELD HEAT TRANSFER CHARACTERISTICS OF THE COMBINED DELTA WING BOOSTER AND MSC ORBITER
1017	UNIQUE CONFIGS.		1	SUPERSONIC AERODYNAMIC AND STATIC STABILITY CHARACTERISTICS OF THE TWIN BODY BOOSTER
1018		UNIQUE CONFIGS.	1	LARC VARIABLE DIHEDRAL ORBITER -- INVESTIGATION OF SUBSONIC STABILITY, CONTROL, AND PERFORMANCE CHARACTERISTICS
1019	UNIQUE CONFIGS.		1	TWIN BODY BOOSTER INVESTIGATION OF SUPERSONIC AERODYNAMIC AND STATIC STABILITY CHARACTERISTICS

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1020	STRAIGHT WING		1	CONVAIR STRAIGHT-WING (B-8B) AND DELTA-WING (B-9J) BOOSTERS -- AERODYNAMIC HEAT TRANSFER TO THE SPACE SHUTTLE BOOSTER SURFACES AT HYPERSONIC SPEEDS
1021		DELTA WING	1	LONGITUDINAL AND LATERAL DIRECTIONAL CHARACTERISTICS AND CONTROL EFFECTIVENESS OF THE NARC 129 SSV ORBITER (DELTA WING, HIGH CROSS RANGE)
1022		DELTA WING	1	MODIFIED MARTIN ORBITER FR. 5-2A -- INVESTIGATION OF SUBSONIC STABILITY, CONTROL AND PERFORMANCE CHARACTERISTICS
1023		DELTA WING	1	LONGITUDINAL AND DIRECTIONAL STATIC STABILITY CHARACTERISTICS OF MARTIN MARIETTA CORPORATION MODIFIED ORBITER (1/170 SCALE)
1024	STRAIGHT WING		1	CONVAIR STRAIGHT-WING (B-8B) AND DELTA-WING (B-9J) BOOSTERS -- AERODYNAMIC HEAT TRANSFER TO THE SPACE SHUTTLE BOOSTER SURFACES AT HYPERSONIC SPEEDS
1025	STRAIGHT WING		1	LONGITUDINAL AERODYNAMIC CHARACTERISTICS OF THE GD/CONVAIR B8B BOOSTER
1026		STRAIGHT WING	1	AERODYNAMIC CHARACTERISTICS OF SPACE SHUTTLE VEHICLES - NORTH AMERICAN ROCKWELL ORBITERS (M = 0.6 TO 2.0)
1027		STRAIGHT WING	1	STATIC STABILITY AND CONTROL INVESTIGATION FOR THE NORTH AMERICAN ROCKWELL DELTA WING (134B) AND STRAIGHT WING (130G) SPACE SHUTTLE ORBITERS
1028		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF MCDONNELL DOUGLAS LOW AND HIGH CROSS-RANGE ORBITERS AT MACH NUMBERS FROM 0.6 TO 2.0

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1029	STRAIGHT WING		1	LONGITUDINAL AND LATERAL AERODYNAMIC CHARACTERISTICS OF THE CONVAIR B8B SPACE SHUTTLE BOOSTER WITH MODIFICATIONS
1030	STRAIGHT WING		1	GENERAL DYNAMICS/CONVAIR SPACE SHUTTLE BOOSTER -- INVESTIGATION OF SUBSONIC STABILITY AND CONTROL EFFECTIVENESS
1031		DELTA WING	1	HYPERSONIC AERODYNAMIC PERFORMANCE AND STABILITY AND CONTROL CHARACTERISTICS OF THE NAR HIGH CROSS-RANGE ORBITER
1032	STRAIGHT WING		1	CONVAIR STRAIGHT WING (B-8B) AND DELTA WING (B-9J) BOOSTERS WITH NAR STRAIGHT WING AND DELTA WING ORBITERS -- INTERFERENCE HEAT TRANSFER TO SPACE SHUTTLE VEHICLE SURFACES IN CLOSE PROXIMITY AT HYPERSONIC VELOCITY
1032	STRAIGHT WING	STRAIGHT WING	1	CONVAIR STRAIGHT WING (B-8B) AND DELTA WING (B-9J) BOOSTERS WITH NAR STRAIGHT WING AND DELTA WING ORBITERS -- INTERFERENCE HEAT TRANSFER TO SPACE SHUTTLE VEHICLE SURFACES IN CLOSE PROXIMITY AT HYPERSONIC VELOCITY
1033	STRAIGHT WING		1	INVESTIGATION OF STATIC AERODYNAMIC CHARACTERISTICS OF THE MSC 251 BOOSTER
1034		STRAIGHT WING	1	EFFECT OF NACELLE POSITION, REPAIRED FUSELAGE, AND ELEVATOR EFFECTIVENESS AT MACH NUMBER 0.26 FOR THE NORTH AMERICAN ROCKWELL STRAIGHT WING ORBITER (0.00761 SCALE)
1035	CANARD		1	LOW SPEED AERODYNAMIC CHARACTERISTICS OF THE MCDONNELL DOUGLAS SPACE SHUTTLE BOOSTER



**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1036	CANARD	DELTA WING	1	THERMAL MAPPING INVESTIGATION MDAC/MMC PHASE B SPACE SHUTTLE VEHICLES
1036	CANARD	DELTA WING	2	THERMAL MAPPING INVESTIGATION MDAC/MMC PHASE B SPACE SHUTTLE VEHICLES -- CONTOUR TRACINGS
1037		DELTA WING	1	INVESTIGATION OF SUBSONIC AERODYNAMIC CHARACTERISTICS OF THE NAR 134B DELTA WING ORBITER
1038	STRAIGHT WING	STRAIGHT WING	1	AERODYNAMIC CHARACTERISTICS OF THE MSC/MDAC SPACE SHUTTLE LAUNCH CONFIGURATION - ORBITER/BOOSTER INTERFERENCE EFFECTS (M = 0.6 TO 2.0)
1039	DELTA WING		1	GENERAL DYNAMICS/CONVAIR SPACE SHUTTLE BOOSTER -- EFFECTS OF CRUISE ENGINE NACELLE ARRANGEMENT AND TAIL SIZE ON STATIC STABILITY AND CONTROL EFFECTIVENESS
1040		DELTA WING	1	LONGITUDINAL AND LATERAL STABILITY CHARACTERISTICS OF THE MDC STS HIGH CROSS RANGE ORBITER ( O2 )
1041		DELTA WING	1	INVESTIGATION OF LOW SPEED AERODYNAMIC CHARACTERISTICS OF A HIGH CROSS RANGE MDC STS ORBITER
1042	STRAIGHT WING	STRAIGHT WING	1	STATIC AERODYNAMIC CHARACTERISTICS OF THE MSC-PROPOSED LAUNCH VEHICLE
1043		STRAIGHT WING	1	STATIC STABILITY AND CONTROL INVESTIGATION FOR THE NORTH AMERICAN ROCKWELL DELTA WING (134B) AND STRAIGHT WING (130G) SPACE SHUTTLE ORBITERS
1044	UNIQUE CONFIGS.	STRAIGHT WING	1	S-IC BOOSTER/GRUMMAN C4 ORBITER DETERMINATION OF DOWNWASH ON 900 SQ. FT., 30 DEGREE ORIENTED S-IC FINS AND OPTIMUM ORBITER BODY AND AERODYNAMIC SURFACE INCIDENCE ANGLES

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1045		DELTA WING	1	MODIFIED MARTIN ORBITER FR5-2A -- INVESTIGATION OF CONFIGURATION CHANGES ON THE SUBSONIC AERODYNAMIC CHARACTERISTICS
1046	UNIQUE CONFIGS.		1	STATIC AERODYNAMIC CHARACTERISTICS OF THE CHRYSLER CORPORATION SPACE DIVISION SERV 1 ASCENT AND REENTRY VEHICLE AT MACH NUMBERS OF 0.4 TO 2.0
1047	DELTA WING	STRAIGHT WING	1	LONGITUDINAL CHARACTERISTICS OF THE NASA-MSC ORBITER IN CLOSE PROXIMITY TO BOOSTER
1048		DELTA WING	1	LONGITUDINAL AND DIRECTIONAL STATIC STABILITY CHARACTERISTICS OF MARTIN MARIETTA CORPORATION MODIFIED ORBITER (1/170 SCALE)
1049		STRAIGHT WING	1	REYNOLDS NUMBER EFFECTS ON THE LOW-SPEED AERODYNAMIC CHARACTERISTICS OF THE NR STRAIGHT- WING ORBITER
1050	STRAIGHT WING	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE NAR/GD SPACE SHUTTLE LAUNCH CONFIGURATION ORBITER/BOOSTER INTERFERENCE EFFECTS (M = 0.6 TO 2.0)
1051	STRAIGHT WING	STRAIGHT WING	1	STATIC STABILITY AND CONTROL INVESTIGATION OF THE NAR-GD/C STRAIGHT WING BOOSTER (B-8H MODIFIED) WITH THE STRAIGHT WING ORBITER (130G) OR DELTA WING ORBITER (134B)
1052	DELTA WING	STRAIGHT WING	1	AERODYNAMIC FORCES AND MOMENT ON ORBITER AND BOOSTER DURING SPACE SHUTTLE ABORT SEPARATION
1053		DELTA WING	1	INVESTIGATION OF THE AERODYNAMIC CHARACTERISTICS OF THE GAC 518 EARTH ORBITING SHUTTLE. CONFIGURATION 11F, AT MACH NUMBER = 0.17

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1054	CANARD		1	SUBSONIC AERODYNAMIC CHARACTERISTICS OF MDAC/MMC SPACE SHUTTLE BOOSTER CONFIGURATION AT MACH NUMBER = 0.26
1055	UNIQUE CONFIGS.	DELTA WING	1	DETERMINATION OF STATIC LONGITUDINAL AND LATERAL DIRECTIONAL STABILITY CHARACTERISTICS OF THE NR/GD DELTA WING ORBITER/SATURN V S-IC BOOSTER
1056		STRAIGHT WING	1	INVESTIGATION OF CONFIGURATION EFFECTS ON ENTRY HEAT TRANSFER DISTRIBUTIONS AND DEFINITION OF INTERFERENCE HEATING AREAS ON SPACE SHUTTLE ORBITER CONFIGURATIONS
1057		STRAIGHT WING	1	INVESTIGATION OF LATERAL AND LONGITUDINAL STATIC STABILITY CHARACTERISTICS OF THE MSC ORBITERS S-1 AND S-5 AT MACH NUMBERS = 0.25
1058	STRAIGHT WING	STRAIGHT WING	1	EFFECTS OF ORBITER/BOOSTER PROXIMITY INTERFERENCE ON THE AERODYNAMIC CHARACTERISTICS OF THE 0.0088105-SCALE MSC LAUNCH CONFIGURATION, MSC TEST SERIES S-XXVIII
1059		DELTA WING	1	MODIFIED MARTIN-MARIETTA DELTA WING ORBITER AERODYNAMIC CHARACTERISTICS WITHOUT WING TIP FINS AND EFFECT OF ELEVON HINGE-LINE SWEEP ON ROLL-YAW COUPLING
1060		STRAIGHT WING	1	AERODYNAMIC CHARACTERISTICS OF THE NASA-MSC S-4 ORBITER IN CRUISE AND LANDING
1061	DELTA WING	STRAIGHT WING	1	LONGITUDINAL CHARACTERISTICS OF THE MDAC CLIPPED-DELTA BOOSTER (PHASE A) IN CLOSE PROXIMITY TO ORBITER
1062		STRAIGHT WING	1	MODEL S-5 NASA/MSC ORBITER SHUTTLE INVESTIGATION OF THE EFFECTS OF VERTICAL TAIL AND GEOMETRY ON DIRECTIONAL STABILITY

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1063	STRAIGHT WING	STRAIGHT WING	1	DETERMINATION OF DRAG, STABILITY AND CONTROL CHARACTERISTICS FOR THE MSC LAUNCH CONFIGURATION (STRAIGHT WING)
1064		STRAIGHT WING	1	DETERMINATION OF STABILITY AND CONTROL CHARACTERISTICS OF THE NAR STRAIGHT WING ORBITER (M = 0.4 TO 1.2)
1065	CANARD	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE MDAC SPACE SHUTTLE BOOSTERS AND ORBITERS IN LAUNCH CONFIGURATIONS (M = 0.6 TO 2.0)
1065	CANARD	DELTA WING	2	AERODYNAMIC CHARACTERISTICS OF THE MDAC SPACE SHUTTLE BOOSTERS AND ORBITERS IN LAUNCH CONFIGURATIONS (M = 0.6 TO 2.0)
1066	CANARD		1	AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF THE MDAC-MMC SSV CONFIGURATION-14 BOOSTER (SINGLE BODY, CANARD) M = 0.6 TO 2.0
1067		DELTA WING	1	LONGITUDINAL AND LATERAL DIRECTIONAL STABILITY CHARACTERISTICS OF THE MDAC HIGH CROSS RANGE DELTA WING ORBITER
1068	UNIQUE CONFIGS.		1	STATIC AERODYNAMIC CHARACTERISTICS OF THE CHRYSLER CORPORATION SPACE DIVISION SERV ASCENT AND REENTRY VEHICLE AT MACH NUMBERS OF 2.6 TO 4.6
1069		STRAIGHT WING	1	STABILITY AND CONTROL INVESTIGATION OF NAR STRAIGHT WING ORBITER (M = 1.5 AND 2.0)
1070	DELTA WING		1	DEFINITION OF REGIONS OF HIGH HEAT TRANSFER AND DETERMINATION OF LOCAL HEAT TRANSFER COEFFICIENTS ON THE DELTA WING BOOSTER WITH CANARDS (B-15B)

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1071		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE MCDONNELL-DOUGLAS DELTA-WING ORBITER SPACE SHUTTLE VEHICLE
1072		STRAIGHT WING	1	STATIC AERODYNAMIC CHARACTERISTICS OF MDAC STRAIGHT-WING AND DELTA-WING SPACE SHUTTLE ORBITERS AT MACH NO. 7.4
1073		STRAIGHT WING	1	EFFECTS OF HORIZONTAL TAIL GEOMETRY AND POSITION ON LONGITUDINAL STABILITY OF MODEL NASA/MSC 0.01875 SCALE ORBITER SHUTTLE
1074		DELTA WING	1	DETERMINATION OF SUBSONIC AERODYNAMIC CHARACTERISTICS FOR MCDONNELL-DOUGLAS GENERIC HIGH CROSS RANGE SHUTTLE ORBITER
1075	STRAIGHT WING	STRAIGHT WING	1	AERODYNAMIC CHARACTERISTICS OF SPACE SHUTTLE CONFIGURATIONS CONSISTING OF A STRAIGHT WING BOOSTER WITH VEE TAIL AND ORBITERS WITH STRAIGHT AND DELTA WINGS -- ISOLATED BOOSTER
1075	STRAIGHT WING	STRAIGHT WING	2	AERODYNAMIC CHARACTERISTICS OF SPACE SHUTTLE CONFIGURATIONS CONSISTING OF STRAIGHT WING BOOSTER WITH VEE TAIL AND ORBITERS WITH STRAIGHT AND DELTA WINGS -- COMPOSITE CONFIGURATIONS
1076		STRAIGHT WING	1	STATIC STABILITY AND CONTROL INVESTIGATION OF THE NAR DELTA WING (134D) AND STRAIGHT WING (130G) SPACE SHUTTLE ORBITERS
1077	CANARD		1	MDAC/MMC SPACE SHUTTLE BOOSTER DETERMINATION OF STABILITY AND CONTROL CHARACTERISTICS AND POWER EFFECTS AT SUBSONIC SPEED (M = 0.0 AND 0.26)

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

<b>DMS DR#</b>	<b>BOOSTER CONFIG. I.D.</b>	<b>ORBITER CONFIG. I.D.</b>	<b>VOL. NUM.</b>	<b>REPORT TITLE</b>
1078		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE NORTH AMERICAN ROCKWELL DELTA-WING ORBITER AT MACH NUMBERS FROM 0.25 TO 2.0
1079	STRAIGHT WING		1	STATIC AERODYNAMIC CHARACTERISTICS OF THE BOEING SPACE SHUTTLE BOOSTER CONFIGURATION AT MACH 0.10 TO 0.29
1080	CANARD		1	HYPERSONIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF THE MDAC-MMC SSV CONFIGURATION - 14 BOOSTER (SINGLE BODY, CANARD) M = 7.4
1081		DELTA WING	1	SUBSONIC AERODYNAMIC CHARACTERISTICS OF THE GAC ORBITER
1082		STRAIGHT WING	1	AERODYNAMIC CHARACTERISTICS OF THE NORTH AMERICAN ROCKWELL STRAIGHT WING ORBITER AT MACH NUMBERS FROM 0.25 TO 2.0
1083		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF MCDONNELL - DOUGLAS DELTA WING ORBITER AT MACH NUMBERS FROM 0.6 TO 2.0
1084		DELTA WING	1	HYPERSONIC LONGITUDINAL AND LATERAL STABILITY AND CONTROL CHARACTERISTICS OF THE NR HIGH CROSS RANGE DELTA WING ORBITER
1085	UNIQUE CONFIGS.	DELTA BODY	1	STATIC AERODYNAMIC CHARACTERISTICS OF THE LMSC STAGE-AND-ONE-HALF SPACE SHUTTLE CONFIGURATION (M = .60 TO 2.0)
1086		DELTA WING	1	STATIC LONGITUDINAL LATERAL AND DIRECTIONAL CHARACTERISTICS OF THE MDAC BASELINE ORBITER AT HYPERSONIC SPEEDS

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1087	DELTA WING		1	AERODYNAMIC CHARACTERISTICS OF THE GENERAL DYNAMICS / CONVAIR SPACE SHUTTLE BOOSTER B-15B-L IN LANDING. CRUISE AND TRANSITION CONFIGURATIONS
1088		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE NR DELTA WING ORBITER (M = 20.3)
1089	UNIQUE CONFIGS.		1	STATIC AERODYNAMIC CHARACTERISTICS OF THE CHRYSLER CORPORATION SPACE DIVISION REVISED BASELINE SERV ASCENT AND REENTRY VEHICLE AT MACH NUMBERS OF 0.4 TO 4.64
1090		STRAIGHT WING	1	SUBSONIC LONGITUDINAL AND LATERAL- DIRECTIONAL STABILITY INVESTIGATION OF THE MDAC LCR ORBITER UNPOWERED AND POWERED
1091	UNIQUE CONFIGS.	DELTA WING	1	STUDY TO DEVELOP A SOLUTION FOR CONFIGURATION INSTABILITY FOR THE 0.003366 SCALE S-IC/NR HCR ORBITER
1092		DELTA WING	1	DETERMINATION OF STATIC AERODYNAMIC CHARACTERISTICS FOR THE NORTH AMERICAN ROCKWELL DELTA WING ORBITER AT MACH NUMBERS OF 0.4 TO 1.3
1093	DELTA WING		1	STATIC AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF THE GD/CONVAIR DELTA WING BOOSTER AT NOMINAL MACH NUMBER = 10.0
1094		DELTA WING	1	AERODYNAMIC FORCE CHARACTERISTICS AND OIL FLOW STUDIES OF A DELTA WINGED SPACE SHUTTLE ORBITER
1095		DELTA WING	1	HYPERSONIC STABILITY AND CONTROL INVESTIGATION AND EVALUATION OF SPLIT ELEVON CONCEPT FOR YAW CONTROL FOR THE 0.00763 SCALE NR DELTA WING ORBITER, HCR 134D/161B

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1096		DELTA WING	1	SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF THE NR DELTA WING ORBITER - 134D/161B
1097		DELTA WING	1	TRANSONIC LONGITUDINAL AND LATERAL AERODYNAMIC CHARACTERISTICS OF THE NR DELTA WING ORBITER 134D
1098	DELTA WING	STRAIGHT WING	1	HEAT TRANSFER RESULTS ON SPACE SHUTTLE PHASE B LAUNCH CONFIGURATION AT MACH NUMBERS OF 2.5 AND 3.7
1099	CANARD	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS AND INTERFERENCE EFFECTS ON THE MDAC COMPLETE ASCENT CONFIGURATION, UPPER STAGE/PAYLOADS, AND BOOSTER
1100	STRAIGHT WING		1	LOW SPEED LONGITUDINAL AND LATERAL AERODYNAMIC CHARACTERISTICS OF THE GD/C B-8H-L BOOSTER
1101		DELTA WING	1	SUPERSONIC AERODYNAMIC STABILITY, CONTROL, AND PERFORMANCE OF A MODIFIED NR-134D ORBITER CONFIGURATION
1102	DELTA WING		1	LONGITUDINAL AND LATERAL AERODYNAMIC CHARACTERISTICS OF THE 0.0035-SCALE GD/C AEROSPACE BOOSTER (B-15B-1)
1104		DELTA WING	1	STABILITY AND CONTROL CHARACTERISTICS FOR NR DELTA WING ORBITER AT HYPERSONIC VELOCITY
1104		DELTA WING	2	STABILITY AND CONTROL CHARACTERISTICS FOR NR STRAIGHT WING ORBITER AT HYPERSONIC VELOCITY
1105		DELTA WING	1	LONGITUDINAL, LATERAL-DIRECTIONAL STABILITY, AND CONTROL CHARACTERISTICS OF THE NR DELTA WING ORBITER OVER MACH NUMBER RANGE OF 0.6 TO 1.2



**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1103		DELTA BODY	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE 0.01-SCALE LMSC DELTA LIFTING BODY ORBITER
1106		DELTA WING	1	REYNOLDS NUMBER EFFECTS ON LONGITUDINAL AND LATERAL DIRECTIONAL STABILITY AND CONTROL OF THE NR DELTA WING ORBITER, 134D/161B
1107		DELTA WING	1	SUBSONIC LONGITUDINAL AND LATERAL AERODYNAMIC CHARACTERISTICS OF THE NR DELTA WING ORBITER 134D
1108	CANARD	DELTA WING	1	INVESTIGATION OF THE MCDONNELL- DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 5 BOOSTER PROXIMITY DATA
1108	CANARD	DELTA WING	2	INVESTIGATION OF THE MCDONNELL- DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS IN PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 5 ORBITER PROXIMITY DATA
1108	CANARD	DELTA WING	3	INVESTIGATION OF THE MCDONNELL- DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 3 BOOSTER PROXIMITY DATA
1108	CANARD	DELTA WING	4	INVESTIGATION OF THE MCDONNELL- DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 3 ORBITER PROXIMITY DATA
1108	CANARD	DELTA WING	5	INVESTIGATION OF THE MCDONNELL- DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 2 BOOSTER PROXIMITY DATA

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1108	CANARD	DELTA WING	6	INVESTIGATION OF THE MCDONNELL-DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- MACH NUMBER 2 ORBITER PROXIMITY DATA
1108	CANARD	DELTA WING	7	INVESTIGATION OF THE MCDONNELL-DOUGLAS ORBITER AND BOOSTER SHUTTLE MODELS PROXIMITY AT MACH NUMBERS 2.0 TO 6.0 -- PROXIMITY DATA AT MACH 4 AND 6, INTERFERENCE FREE AND LAUNCH VEHICLE DATA
1109	DELTA WING		1	AERODYNAMIC CHARACTERISTICS OF GD B-15B BOOSTER DURING CRUISE AND LANDING M = 0.2
1110	DELTA WING		1	LOW SPEED CRUISE, TAKEOFF AND LANDING AERODYNAMIC CHARACTERISTICS, INCLUDING ENGINE EXHAUST EFFECTS OF THE GD/C B-15B BOOSTER
1111	STRAIGHT WING		1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE BOOSTER WITH STRAIGHT WING AND HORIZONTAL TAIL (M = 0.26 TO 2.0)
1112		UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF TWO DELTA WING SPACE SHUTTLE ORBITERS WITH AND WITHOUT EXTERNAL HYDROGEN TANKS (M = 0.3 TO 2.0)
1113		DELTA WING	1	STATIC LONGITUDINAL AND LATERAL-DIRECTIONAL CHARACTERISTICS OF THE NR 134-D DELTA WING ORBITER M = 10.4 )
1114		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE NR DELTA WING ORBITER M = 0.6 - 1.3
1115	STRAIGHT WING	STRAIGHT WING	1	EFFECT OF ORBITER/BOOSTER PROXIMITY INTERFERENCES ON THE AERODYNAMIC CHARACTERISTICS OF THE LAUNCH CONFIGURATION DURING SEPARATION OR ABORT MANEUVERS M = 0.6 - 1.38

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1116	CANARD		1	TRANSONIC/SUPERSONIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF THE PROPOSED HIGH-WING SINGLE-BODY CANARD SSV BOOSTER VEHICLE M = 0.6 TO 2.0
1117	CANARD	DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MDAC/MMC SBC BOOSTER, DELTA WING ORBITER, AND ASCENT CONFIGURATIONS
1117	CANARD	DELTA WING	2	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MDAC/MMC SBC BOOSTER, DELTA WING ORBITER, AND ASCENT CONFIGURATIONS
1117	CANARD	DELTA WING	3	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MDAC/MMC SBC BOOSTER, DELTA WING ORBITER, AND ASCENT CONFIGURATIONS
1118	CANARD	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA-WING ORBITER AND A BOOSTER WITH CANARD. AFT SWEPT WING, AND TIP FINS (M = 0.6 TO 2.0)
1118	CANARD	DELTA WING	2	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA-WING ORBITER AND A BOOSTER WITH CANARD, AFT SWEPT WING, AND TIP FINS (M = 0.6 TO 2.0)
1119	DELTA WING	UNIQUE CONFIGS.	1	STATIC AERODYNAMIC AND CONTROL INVESTIGATION OF AN EXPENDABLE SECOND STAGE WITH PAYLOAD AND WITH DELTA WING BOOSTER (B-15B-1)
1120	CANARD		1	STATIC LONGITUDINAL, DIRECTIONAL AND LATERAL CHARACTERISTICS AND CONTROL SURFACE EFFECTIVENESS OF THE MDAC-STS CANARD BOOSTER
1121	DELTA WING		1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE BOOSTER WITH DELTA WING AND CANARD AT MACH NUMBERS OF 0.6 TO 2.0 (MARCH 1971 TESTS)

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

<b>DMS DR#</b> -----	<b>BOOSTER CONFIG. I.D.</b> -----	<b>ORBITER CONFIG. I.D.</b> -----	<b>VOL. NUM.</b> -----	<b>REPORT TITLE</b> -----
1122	STRAIGHT WING	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF A DELTA-WING ORBITER AND STRAIGHT-WING BOOSTER SPACE SHUTTLE LAUNCH VEHICLE FOR MACH NUMBERS FROM 0.25 TO 2.0
1123		DELTA WING	1	STATIC STABILITY AND CONTROL CHARACTERISTICS OF THREE ELEVON CONFIGURATIONS, YAW CONTROL FLAP AND WING-MOUNTED DORSAL FINS OF A SPACE SHUTTLE PARAMETRIC DELTA WING ORBITER (M = 10.4)
1124		DELTA WING	1	LOW SPEED STABILITY AND CONTROL CHARACTERISTICS OF THE NORTH AMERICAN ROCKWELL DELTA WING ORBITER -134D AND -134C CONFIGURATIONS
1125	UNIQUE CONFIGS.		1	STATIC PRESSURE DISTRIBUTION ON CHRYSLER CORPORATION SPACE DIVISION SERV BOOSTER CONFIGURATION
1126		DELTA WING	1	STATIC STABILITY AND CONTROL CHARACTERISTICS OF THE NR DELTA WING (134D) SPACE SHUTTLE ORBITER M = 0.6 - 5.0
1127	DELTA WING	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA WING ORBITER AND A DELTA WING BOOSTER (M = 0.6 TO 2.0)
1128	CYLINDRICAL		1	AERODYNAMIC CHARACTERISTICS IN NOSE-FIRST, NOZZLE-FIRST, AND TUMBLING RE-ENTRY MODES AND EFFECTIVENESS OF SEVERAL DRAG DEVICES FOR THE BOEING 0.0144-SCALE PARALLEL-BURN SOLID ROCKET MOTOR, MODEL 979-185

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1129	STRAIGHT WING	DELTA WING	1	PRESSURE TESTS OF MODELS OF A STRAIGHT-WING ORBITER, DELTA-WING ORBITER, AND A STRAIGHT-WING BOOSTER (MACH NUMBER 0.6 TO 2.2) -- STRAIGHT-WING BOOSTER
1129	STRAIGHT WING	DELTA WING	2	PRESSURE TESTS OF MODELS OF A STRAIGHT-WING ORBITER, DELTA-WING ORBITER, AND A STRAIGHT-WING BOOSTER (MACH NUMBER 0.6 TO 2.2) -- DELTA-WING ORBITER
1129	STRAIGHT WING	DELTA WING	3	PRESSURE TESTS OF MODELS OF A STRAIGHT-WING ORBITER, DELTA-WING ORBITER, AND A STRAIGHT-WING BOOSTER (MACH NUMBER 0.6 TO 2.2) -- STRAIGHT-WING ORBITER
1130	DELTA WING	DELTA WING	1	STATIC STABILITY AND CONTROL INVESTIGATION OF NR/GD DELTA WING BOOSTER (B-20) AND DELTA WING ORBITER (134D) -- DELTA WING BOOSTER
1130	DELTA WING	DELTA WING	2	STATIC STABILITY AND CONTROL INVESTIGATION OF NR/GD DELTA WING BOOSTER (B-20) AND DELTA WING ORBITER (134D) -- LAUNCH CONFIGURATION PIGGYBACK BASELINE
1130	DELTA WING	DELTA WING	3	STATIC STABILITY AND CONTROL INVESTIGATION OF NR/GD DELTA WING BOOSTER (B-20) AND DELTA WING ORBITER (134D) -- LAUNCH CONFIGURATIONS PIGGYBACK, BELLY TO BELLY AND INCIDENCE VARIATIONS
1130	DELTA WING	DELTA WING	4	STATIC STABILITY AND CONTROL INVESTIGATION OF NR/GD DELTA WING BOOSTER (B-20) AND DELTA WING ORBITER (134D) -- LAUNCH CONFIGURATIONS COMPONENT DATA BOOSTER. ORBITER BUILD-UP
1131		STRAIGHT WING	1	AERODYNAMIC HEATING OF A SPACE SHUTTLE STRAIGHT-WING ORBITER
1132	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1133	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1134	STRAIGHT WING		1	AERODYNAMIC HEATING OF A SPACE SHUTTLE STRAIGHT WING BOOSTER
1135	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1136	STRAIGHT WING	UNIQUE CONFIGS.	1	FORCES, MOMENTS AND PRESSURES ON VARIOUS EXTERNAL LIQUID HYDROGEN TANKS MOUNTED ON A BOOSTER/ORBITER MATED LAUNCH CONFIGURATION
1137	STRAIGHT WING	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA WING ORBITER WITH EXTERNAL HYDROGEN TANKS AND A STRAIGHT WING BOOSTER (M = 0.6 TO 2.0)
1138	CANARD		1	THERMAL MAPPING INVESTIGATION OF A 0.0035 SCALE MDC/MMC PHASE B BOOSTER CONFIGURATION WITH VENTRAL TIP FINS
1139	CANARD		1	STABILITY AND CONTROL EFFECTIVENESS OF THE MDAC PARAMETRIC DELTA CANARD BOOSTER AT MACH 0.38 -- CANARD PARAMETRIC VARIATIONS
1139	CANARD		2	STABILITY AND CONTROL EFFECTIVENESS OF THE MDAC PARAMETRIC DELTA CANARD BOOSTER AT MACH 0.36 -- WING PARAMETRIC VARIATIONS - SIZE AND LOCATION
1139	CANARD		3	STABILITY AND CONTROL EFFECTIVENESS OF THE MDAC PARAMETRIC DELTA CANARD BOOSTER AT MACH 0.36 -- WING PARAMETRIC VARIATIONS - INCIDENCE AND DIHEDRAL
1139	CANARD		4	STABILITY AND CONTROL EFFECTIVENESS OF THE MDAC PARAMETRIC DELTA CANARD BOOSTER AT MACH 0.36 -- SURFACE EFFECTIVENESS, MODEL BUILDUP. AND DIRECTIONAL STABILITY AT HIGH ANGLES OF ATTACK

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1140	UNIQUE CONFIGS.	UNIQUE CONFIGS.	1	EFFECT OF ORBITER INCIDENCE ANGLE ON THE AERODYNAMIC CHARACTERISTICS OF THE BOEING S-IC BOOSTER/GAC G-11 ORBITER LAUNCH CONFIGURATION (M = 0.6 - 4.96)
1141	DELTA WING		1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE BOOSTER WITH A DELTA WING AND CANARD (M = 0.6 TO 2.0)
1142		DELTA WING	1	BASIC AERODYNAMIC CHARACTERISTICS FOR THREE GAC REUSABLE ORBITAL SPACE-PLANE CONFIGURATIONS, ROS-NB1, ROS-NB2, AND ROS-WB1 AT 0.17 MACH NUMBER
1143	UNIQUE CONFIGS.	DELTA BODY	1	HEAT TRANSFER TESTS OF THE LMSC DELTA-BODY ORBITER AND STAGE-AND-ONE-HALF ASCENT CONFIGURATION
1144		DELTA WING	1	SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A NR DELTA WING ORBITER - PART II M = 2.5 - 4.6
1145	DELTA WING	DELTA WING	1	HEAT TRANSFER TEST TO DETERMINE THERMAL PROTECTION SYSTEM DESIGN REQUIREMENTS FOR BOOSTERS B-9U, B-15B-2, AND BOOSTER/ORBITER B-9U/161C
1146		DELTA WING	1	HEAT TRANSFER TEST TO DETERMINE INTERFERENCE HEATING ON THE GRUMMAN DELTA-WING ORBITER (ROS-NB2) AND TANK SURFACES AT MACH 10.0
1147		DELTA BODY	1	STATIC STABILITY, CONTROL, AND PERFORMANCE OF LOCKHEED DELTA BODY ORBITER AT 0.205 MACH NUMBER
1148	CANARD	DELTA WING	1	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF A TBC SPACE SHUTTLE BOOSTER AND GAC ORBITER M = 0.6 - 4.96

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1149		DELTA WING	1	LONGITUDINAL AND LATERAL- DIRECTIONAL AERODYNAMIC CHARACTERISTICS OF THE LARC MODEL, MDAC DELTA WING ORBITER
1150	DELTA WING		1	AERODYNAMIC CHARACTERISTICS OF THE GD/C B-9U BOOSTER IN LANDING AND CRUISE CONFIGURATIONS
1151		DELTA WING	1	HYPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MCDONNELL- DOUGLAS 050B DELTA WING ORBITER (M = 10.23)
1152	DELTA WING		1	VERIFICATION OF BOOSTER TRANSITION CHARACTERISTICS FOR TRANSONIC AND SUPERSONIC MACH NUMBERS (M = 0.6-5.0)
1153		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS FOR MCDONNELL-DOUGLAS ORBITER CONFIGURATION FOR MACH NUMBER RANGE OF 0.4 TO 5.0
1154		DELTA WING	1	AERODYNAMIC HEATING OF THE GRUMMAN SPACE SHUTTLE ORBITERS (ROS-NB1 AND ROS-WBL) AT MACH NUMBER 8.0
1155	DELTA WING		1	EFFECT OF CONFIGURATION CHANGES ON THE DIRECTIONAL CHARACTERISTICS OF A GD/C BOOSTER MACH NO. 1.2 - 4.96
1156	DELTA WING		1	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF A GD/C B-9U DELTA WING BOOSTER M = 10.2
1157		DELTA BODY	1	STABILITY CONTROL AND PERFORMANCE CHARACTERISTICS OF THE LMSC DELTA BODY ORBITER AT SUBSONIC SPEEDS
1158	STRAIGHT WING		1	STATIC STABILITY CHARACTERISTICS AND CONTROL SURFACE EFFECTIVENESS OF THE BOEING .00435 SCALE MODEL SPACE SHUTTLE BOOSTER H-32



**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1159		DELTA WING	1	BASIC HYPERSONIC FORCE DATA FOR GRUMMAN DELTA WING ORBITER CONFIGURATIONS ROS-NB1 AND ROS-WB1
1160	CANARD		1	INVESTIGATION OF THE AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF THE TBC SHUTTLE BOOSTER AR-11981-3
1161		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS FOR THE GAC ROS-NB1 AND ROS-WB1 ORBITER CONFIGURATIONS AT TRANSONIC MACH NUMBERS ( $M = 0.7 - 1.16$ )
1162	DELTA WING	UNIQUE CONFIGS.	1	A STATIC STABILITY AND CONTROL INVESTIGATION OF THE NR-GD/C DELTA WING BOOSTER (B-15B-1) AND A REUSABLE NUCLEAR STAGE (RNS) $M = 0.6 - 4.96$
1163		DELTA WING	1	BASIC SUPERSONIC FORCE DATA FOR GRUMMAN DELTA WING ORBITER CONFIGURATION ROS-NB1
1164	CANARD		1	EFFECTS OF CRUISE ENGINE LOCATION AND POWER ON INTERFERENCE FOR A MSFC PARAMETRIC BOOSTER ( $M = 0.40$ TO $1.13$ )
1165		DELTA WING	1	HEAT TRANSFER VERIFICATION ON NORTH AMERICAN ROCKWELL DELTA WING ORBITER (SSV-161B)
1166	CANARD	UNIQUE CONFIGS.	1	DETERMINATION OF THE STATIC STABILITY CHARACTERISTICS OF THE 0.00285-SCALE MDAC PARALLEL BURN LAUNCH CONFIGURATION
1167		DELTA WING	1	BASIC SUBSONIC STATIC AERODYNAMIC CHARACTERISTICS FOR GRUMMAN H-33 ORBITER CONFIGURATION ( $M = 0.17$ )
1168		DELTA WING	1	SUBSONIC PERFORMANCE, STATIC STABILITY, AND CONTROL EFFECTIVENESS OF A PARAMETRIC DELTA WING ORBITER

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

<b>DMS DR#</b>	<b>BOOSTER CONFIG. I.D.</b>	<b>ORBITER CONFIG. I.D.</b>	<b>VOL. NUM.</b>	<b>REPORT TITLE</b>
1169		DELTA BODY	1	LMSC DELTA BODY ORBITER STALL CHARACTERISTICS AS INFLUENCED BY FIN AND BODY GEOMETRY VARIATIONS
1170	CANARD	DELTA WING	1	AERODYNAMIC HEATING TESTS OF THE MDAC DELTA WING ORBITER AND CANARD BOOSTER
1171		DELTA WING	1	STATIC LONGITUDINAL AND LATERAL-DIRECTIONAL AERODYNAMIC CHARACTERISTICS OF THE MDAC DELTA WING ORBITER WITH FLARED RUDDER AND RL-10 ENGINE FAIRING
1172		DELTA WING	1	DETERMINATION OF LOW SPEED LONGITUDINAL AND LATERAL-DIRECTIONAL AERODYNAMIC CHARACTERISTICS OF THE 0.007-SCALE MDAC DELTA WING ORBITER WITH AND WITHOUT ENGINE FAIRING
1173		DELTA WING	1	DETERMINATION OF TRIM CHARACTERISTICS AND AILERON CONTROL AT SUPERSONIC SPEEDS FOR THE MDAC 050-B ORBITER
1174	CANARD	DELTA WING	1	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- BOOSTER DATA AT MACH 5
1174	CANARD	DELTA WING	2	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- ORBITER DATA AT MACH 5
1174	CANARD	DELTA WING	3	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- BOOSTER DATA AT MACH 3
1174	CANARD	DELTA WING	4	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- ORBITER DATA AT MACH 3
1174	CANARD	DELTA WING	5	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- BOOSTER DATA AT MACH 2

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1174	CANARD	DELTA WING	6	SPACE SHUTTLE ABORT SEPARATION PRESSURE INVESTIGATION -- ORBITER DATA AT MACH 2
1175		DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MCDONNELL- DOUGLAS 050B DELTA WING ORBITER
1176		DELTA WING	1	STATIC LONGITUDINAL AND LATERAL- DIRECTIONAL CHARACTERISTICS FOR NR 134D AND 134D/161B DELTA WING ORBITERS (M = 20.3)
1177	DELTA WING	DELTA WING	1	HEAT TRANSFER RATE MEASUREMENTS ON CONVAIR BOOSTER (B-15B-2) AND NORTH AMERICAN ROCKWELL ORBITER (161B) AT NOMINAL MACH NUMBER OF 8
1177	DELTA WING	DELTA WING	2	HEAT TRANSFER RATE MEASUREMENTS ON CONVAIR BOOSTER (B-15B-2) AT NOMINAL MACH NUMBER OF 8
1177	DELTA WING	DELTA WING	3	HEAT TRANSFER RATE MEASUREMENTS ON NORTH AMERICAN ROCKWELL ORBITER (161B) AT NOMINAL MACH NUMBER OF 8
1178	CYLINDRICAL	UNIQUE CONFIGS.	1	DETERMINATION OF REENTRY HEAT TRANSFER TO ORBITER SURFACES AND INTERFERENCE HEATING DURING LAMINAR PORTION OF LAUNCH, BOOST, AND HIGH-ALTITUDE ABORT REENTRY FOR THE GAC H-3T DELTA-WING ORBITER WITH EXTERNAL TANKS AND BOEING 1202 BOOSTER
1179	DELTA WING		1	AERODYNAMIC HEATING OF A SPACE SHUTTLE DELTA-WING BOOSTER AT M = 7.4
1180		DELTA WING	1	AERODYNAMIC HEATING OF A SPACE SHUTTLE DELTA-WING ORBITER AT M = 7.4
1181	CYLINDRICAL	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF THE GRUMMAN H-33 ORBITER MATED TO A THREE SEGMENT SOLID PROPELLANT BOOSTER

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1182	UNIQUE CONFIGS.	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF SEVERAL LAUNCH CONFIGURATIONS UTILIZING THE TITAN 111 L BOOSTER AND MMC DTO-7 ORBITER
1182		UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF SEVERAL LAUNCH CONFIGURATIONS UTILIZING THE TITAN III L BOOSTER AND MMC DTO-7 ORBITER
1183	DELTA WING	DELTA WING	1	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.0036-SCALE BOEING RS-1C/MS-040A ORBITER AT MACH NUMBERS 0.6 TO 5.0
1184		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF THE H-33 ORBITER AT MACH NUMBERS FROM 0.6 TO 4.96
1185	CYLINDRICAL	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF THE NORTH AMERICAN ROCKWELL SPACE SHUTTLE DELTA-WING ORBITER (110C) ALONE AND WITH BELLY-MOUNTED EXTERNAL OXYGEN/HYDROGEN TANKS (M = 0.6 TO 5.0)
1186		DELTA WING	1	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF THE NASA/MS-006 SCALE 040-A DELTA WING ORBITER
1187	UNIQUE CONFIGS.	UNIQUE CONFIGS.	1	STATIC AERODYNAMIC CHARACTERISTICS OF THE S-1C BOOSTER/GAC H-33 ORBITER LAUNCH VEHICLE CONFIGURATION
1188	UNIQUE CONFIGS.	UNIQUE CONFIGS.	1	AERODYNAMIC CHARACTERISTICS OF THE TITAN T 111 L (1207-4)/GAC H-33 LAUNCH CONFIGURATION
1189		DELTA WING	1	LOW SPEED AERODYNAMIC CHARACTERISTICS OF A GAC H-33 ORBITER
1190	CANARD	DELTA WING	1	HYPERSONIC STATIC LONGITUDINAL AERODYNAMIC CHARACTERISTICS OF PHASE B ASCENT CONFIGURATIONS

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1191	STRAIGHT WING		1	VERIFICATION OF TRANSONIC REENTRY CORRIDOR AT HIGH ANGLES OF ATTACK AND DETERMINATION OF TRANSITION AERODYNAMIC CHARACTERISTICS AND SUBSONIC AERODYNAMIC CHARACTERISTICS AT LOW ANGLES OF ATTACK FOR THE BOEING H-32 BOOSTER
1192	CANARD		1	DIRECTIONAL AND LATERAL STABILITY AND INTERFERENCE EFFECTS OF CRUISE ENGINE LOCATION ON A 0.015 SCALE SHUTTLE BOOSTER
1193	UNIQUE CONFIGS.		1	SUBSONIC STABILITY AND PERFORMANCE OF A LOW FINENESS RATIO BOOSTER (M = 0.25)
1194		DELTA WING	1	HYPERSONIC AERODYNAMIC CHARACTERISTICS WITH CONTROL EFFECTIVENESS OF A GAC H-33 ORBITER M = 10.2
1195		DELTA WING	1	TRANSONIC AERODYNAMIC CHARACTERISTICS OF A GAC H-33 ORBITER M = 0.6 TO 1.2
1196		DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF A GAC H-33 ORBITER M = 1.6 TO 2.16
1197	UNIQUE CONFIGS.	DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF A LOW FINENESS RATIO BOOSTER WITH DELTA WING ORBITER LAUNCH CONFIGURATION (M = 1.5 TO 2.16)
1198	UNIQUE CONFIGS.	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A LOW-FINENESS-RATIO BOOSTER AND ASCENT CONFIGURATION AT HYPERSONIC SPEED M = 10.23
1199		DELTA WING	1	STATIC STABILITY AND CONTROL CHARACTERISTICS OF TWO ELEVON CONFIGURATIONS. A YAW CONTROL FLAP AND WING-MOUNTED DORSAL FINS OF A SPACE SHUTTLE PARAMETRIC DELTA WING ORBITER (M = 2.01)

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1200	UNIQUE CONFIGS.	DELTA WING	1	TRANSONIC AERODYNAMIC CHARACTERISTICS OF A LOW FINENESS RATIO BOOSTER AND DELTA WING ORBITER LAUNCH CONFIGURATION (M = 0.4 TO 1.2)
1201		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF TWO DELTA WING ORBITER CONFIGURATIONS (M = 0.6 TO 1.96)
1202		DELTA WING	1	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF THE MSC 040-A ORBITER WITH VARIATIONS OF BODY, WING, VERTICAL TAIL AND CANOPY ( M = 0.6 TO 2.0)
1203		DELTA WING	1	HYPERSONIC AERODYNAMIC CHARACTERISTICS WITH CONTROL EFFECTIVENESS OF A GAC H-33 ORBITER M = 6.0
1204	CYLINDRICAL	DELTA WING	1	DETERMINATION OF LONGITUDINAL AND LATERAL-DIRECTIONAL AERODYNAMIC CHARACTERISTICS OF THE B19B PRESSURE-FED BOOSTER AND THE B19B BOOSTER/040A ORBITER LAUNCH CONFIGURATION
1205		STRAIGHT WING	1	AN INVESTIGATION OF THE LANDING CHARACTERISTICS OF THE NASA-MSC AUGUST 1969 BASELINE ORBITER CONFIGURATION IN GROUND EFFECT
1206		DELTA WING	1	HEAT TRANSFER INVESTIGATION OF THE MCDONNELL-DOUGLAS DELTA WING ORBITER AT A NOMINAL MACH NUMBER OF 10.5
1207	CANARD	DELTA WING	1	HEAT TRANSFER RATE DISTRIBUTIONS ON MCDONNELL-DOUGLAS DELTA WING ORBITER DETERMINED BY PHASE-CHANGE PAINT TECHNIQUE FOR NOMINAL MACH NUMBER OF 8

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

<b>DMS DR#</b>	<b>BOOSTER CONFIG. I.D.</b>	<b>ORBITER CONFIG. I.D.</b>	<b>VOL. NUM.</b>	<b>REPORT TITLE</b>
1207	CANARD	DELTA WING	2	HEAT TRANSFER RATE DISTRIBUTIONS ON MCDONNELL-DOUGLAS BOOSTER DETERMINED BY PHASE-CHANGE TECHNIQUE FOR NOMINAL MACH NUMBER OF 8
1208	CYLINDRICAL		1	AERODYNAMIC CHARACTERISTICS OF THE MSFC PRESSURE-FED BOOSTERS AT HIGH ANGLES OF ATTACK (M = 0.6 TO 5.0)
1209	DELTA WING		1	FOREBODY AND VERTICAL STABILIZER EFFECTS ON DIRECTIONAL STABILITY OF A REUSABLE LOX/RP (061) BOOSTER AR 12161-2
1210	CYLINDRICAL	DELTA WING	1	HIGH ANGLE OF ATTACK TRANSITION AND LOW ANGLE OF ATTACK LAUNCH PHASE AERODYNAMIC STABILITY AND CONTROL OF GD/C B-18E-2, B-18E-3 DELTA WING BOOSTER, AND LAUNCH CONFIGURATION OF MSC-040A ORBITER AND TWIN PRESSURE FED BOOSTERS
1211		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS AND OIL FLOW AND ELECTRON BEAM ILLUMINATION RESULTS OF 0.005854 AND 0.003366-SCALE MODELS OF THE GRUMMAN AIRCRAFT CORPORATION SPACE SHUTTLE ORBITER (H-33) AT A MACH NUMBER OF 20.3
1212	CANARD		1	EXPERIMENTAL INVESTIGATIONS FOR CASE DRAG REDUCTION ON A 0.015 SCALE MODEL MSFC PROPOSED SPACE SHUTTLE BOOSTER AT MACH NUMBERS FROM 0.40 TO 1.10
1213	DELTA WING	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF 0.003367 SCALE MODELS OF THE MMC RETRO-GLIDE BOOSTER ALONE AND MATED WITH THE MSC 040-A ORBITER
1214	CYLINDRICAL		1	HYPersonic PERFORMANCE AND STABILITY OF TBC PROPOSED SPACE SHUTTLE PRESSURE-FED BOOSTER AT HIGH ANGLES OF ATTACK

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1215		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A 19 PERCENT SCALE MODEL MSC 040A SPACE SHUTTLE ORBITER AT VARIOUS REYNOLDS NUMBERS (M = 0.25)
1216		DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF A GAC H-33 ORBITER (M = 2.30 TO 4.63)
1217	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1218		DELTA WING	1	NOSE SHAPE AND CANOPY EFFECTS ON THE STATIC AERODYNAMIC CHARACTERISTICS OF THE 040A SHUTTLE ORBITER AT M = 20.3
1219		DELTA WING	1	HYPERSONIC AERODYNAMIC CHARACTERISTICS OF A 0.0075 SCALE MODEL MSC-040A SPACE SHUTTLE ORBITER (M = 10.3)
1220	DELTA WING		1	HYPERSONIC HIGH ANGLE-OF-ATTACK AERODYNAMIC CHARACTERISTICS AND BODY GEOMETRY AND FLYBACK ENGINE LOCATION EFFECTS OF THE 0.0035 SCALE FLYABLE LOX/RP BOOSTER VEHICLE
1221		DELTA WING	1	SUPERSONIC AERODYNAMIC CHARACTERISTICS OF THE MSC 040A ORBITER (M = 2.0 TO 4.0)
1222	CANARD	DELTA WING	1	PRESSURE INVESTIGATION OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA-WING ORBITER AND A SWEPT-WING BOOSTER WITH CANARD AND TIP FINS (M = 0.6 TO 1.3)
1222	CANARD	DELTA WING	2	PRESSURE INVESTIGATION OF A SPACE SHUTTLE LAUNCH CONFIGURATION CONSISTING OF A DELTA-WING ORBITER AND A SWEPT-WING BOOSTER WITH CANARD AND TIP FINS (M = 0.6 TO 1.3)
1223	DELTA WING		1	LOW SPEED AERODYNAMIC CHARACTERISTICS OF THE GD/C B-18E3 BOOSTER



**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1224		DELTA BODY	1	HEAT TRANSFER INVESTIGATION OF TWO LANGLEY RESEARCH CENTER DELTA WING CONFIGURATIONS AT A MACH NUMBER OF 10.5
1224		DELTA BODY	2	HEAT TRANSFER INVESTIGATION OF LANGLEY RESEARCH CENTER TRANSITION MODELS AT A MACH NUMBER OF 8
1225	CANARD	DELTA WING	1	SURFACE PRESSURE AND INVISCID FLOW FIELD PROPERTIES OF THE MCDONNELL-DOUGLAS DELTA-WING ORBITER FOR NOMINAL MACH NUMBER OF 8
1225	CANARD	DELTA WING	2	SURFACE PRESSURE AND INVISCID FLOW FIELD PROPERTIES OF THE NORTH AMERICAN ROCKWELL DELTA-WING ORBITER FOR NOMINAL MACH NUMBER OF 8
1225	CANARD	DELTA WING	3	SURFACE PRESSURE AND INVISCID FLOW FIELD PROPERTIES OF THE MCDONNELL-DOUGLAS BOOSTER AT NOMINAL MACH NUMBER OF 8
1226	CYLINDRICAL		1	AERODYNAMIC STABILITY AND DRAG CHARACTERISTICS OF THE MSFC PRESSURE FED BOOSTER CONFIGURATIONS AT MACH NUMBERS FROM 0.9 TO 5.0
1227	CYLINDRICAL	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A COMPOSITE BOOSTER/040A ORBITER LAUNCH CONFIGURATION WITH FIN AND BOOSTER BODY CONFIGURATION EFFECT CONTRIBUTION
1228	CYLINDRICAL		1	RE-ENTRY STABILITY AND PERFORMANCE CHARACTERISTICS IN THE TRANSONIC AND SUPERSONIC FLIGHT REGIMES OF THE BOEING BALLISTIC RECOVERABLE BOOSTER

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1229		DELTA WING	1	STATIC STABILITY AND CONTROL EFFECTIVENESS OF A LARC SPACE SHUTTLE ORBITER MODEL WITH A PLANE AND A TWISTED AND CAMBERED WING AT MACH NUMBER 0.25
1230	CYLINDRICAL	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE FED AND SRM BOOSTERS -- VOLUME I - ASCENT CONFIGURATION WITH HO CENTERLINE TANKS T1 AND T2
1230	CYLINDRICAL	DELTA WING	2	AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE FED AND SRM BOOSTERS -- VOLUME II - ASCENT CONFIGURATION WITH HO CENTERLINE TANK T3
1230	CYLINDRICAL	DELTA WING	3	AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE FED AND SRM BOOSTERS -- VOLUME III - ASCENT CONFIGURATION WITH HO CENTERLINE TANK T4
1230	CYLINDRICAL	DELTA WING	4	AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE FED AND SRM BOOSTERS -- VOLUME IV - ASCENT CONFIGURATION PLUME STUDIES AND CONFIGURATION BUILDUP
1230	CYLINDRICAL	DELTA WING	5	AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE FED AND SRM BOOSTERS -- VOLUME V - ORBITER ALONE, TANKS ALONE, AND BOOSTER ALONE

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1231		DELTA WING	1	HEAT TRANSFER RATE DISTRIBUTIONS ON NORTH AMERICAN ROCKWELL DELTA WING ORBITER DETERMINED BY PHASE CHANGE PAINT TECHNIQUES AT A MACH NUMBER OF 8
1232		DELTA WING	1	INVESTIGATION OF PROPULSION PACKAGES FOR THE NASA/LARC PARAMETRIC DELTA WING ORBITER
1233		DELTA WING	1	AN INVESTIGATION OF THE SUBSONIC STABILITY AND CONTROL CHARACTERISTICS OF A "STRETCHED" PAYLOAD TYPE DELTA WING ORBITER
1234	CYLINDRICAL	DELTA WING	1	HEAT TRANSFER STUDY OF THE GRUMMAN H-33/HO ORBITER
1235		DELTA WING	1	STABILITY AND CONTROL CHARACTERISTICS OF ORBITER WITH TWISTED AND CAMBERED WING AT SUPERSONIC SPEEDS
1236	CYLINDRICAL		1	AERODYNAMIC HEATING ON SPACE SHUTTLE BOOSTER NOSE-FUSELAGE CONFIGURATIONS AT M = 6
1237	DELTA WING	DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS OF STAGE ARRANGEMENTS AT SUPERSONIC SPEEDS FOR A SPACE SHUTTLE (.0056 SCALE MODEL)
1238	CANARD	DELTA WING	1	ASCENT SHOCK IMPINGEMENT HEATING ON A MDAC SHUTTLE CONFIGURATION, M = 6.0
1239		DELTA WING	1	EFFECT OF ROUGHNESS ON AERODYNAMIC CHARACTERISTICS OF GRUMMAN H-33 ORBITER AT M = 0.25
1240	CYLINDRICAL		1	AERODYNAMIC STATIC STABILITY CHARACTERISTICS, FIN EFFECTIVENESS, AND FIN LOCATION OF THE MSFC 33-FOOT PRESSURE FED BOOSTER AT HIGH ANGLES OF ATTACK

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1241	CYLINDRICAL	DELTA WING	1	ABORT STAGING CHARACTERISTICS OF AN EXTERNAL OXYGEN TANK SEPARATING FROM THE SPACE SHUTTLE 040-A ORBITER (.006 SCALE MODEL) AT MACH NUMBERS OF 0.6, 2.0 AND 4.0
1242	CYLINDRICAL		1	AERODYNAMIC CHARACTERISTICS OF CONE-CYLINDER-FLARE-FIN CONFIGURATIONS AT MACH NUMBERS OF 1.96, 2.74, AND 4.96 AND ANGLES OF ATTACK FROM 60 TO 90 DEGREES
1243		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS OF THE MSC-040A SPACE SHUTTLE ORBITER WITH WEDGE CENTERLINE VERTICAL AND TWIN VERTICAL TAILS AT MACH NUMBERS FROM 0.6 TO 4.96
1244	DELTA WING		1	AERODYNAMIC HEATING DATA ON THE SPACE SHUTTLE B-18E3 BOOSTER CONFIGURATION AT M = 6
1245	CYLINDRICAL		1	AERODYNAMIC STATIC STABILITY CHARACTERISTICS OF THE MSFC 33-FOOT PUMP FED BOOSTER AT HIGH ANGLES OF ATTACK
1246	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1247	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1248	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1249	CYLINDRICAL	DELTA WING	1	AERODYNAMIC STABILITY AND DRAG CHARACTERISTICS OF A PARALLEL BURN/SRM ASCENT CONFIGURATION AT MACH NUMBERS FROM 0.6 TO 4.96
1250		DELTA WING	1	EFFECTS OF REYNOLDS NUMBER ON AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF THE MANNED SPACECRAFT CENTER CLASS 040 SPACE SHUTTLE ORBITER AT MACH NUMBERS OF 0.6 TO 1.2

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1251	CYLINDRICAL	DELTA WING	1	AERODYNAMIC STABILITY AND DRAG CHARACTERISTICS OF A PARALLEL BURN/SRM ASCENT CONFIGURATION (M = 0.6 TO 4.96)
1252		DELTA WING	1	AERODYNAMIC HEATING DISTRIBUTIONS ON A SPACE SHUTTLE DELTA-WING ORBITER
1253	CYLINDRICAL		1	AERODYNAMIC CHARACTERISTICS OF A 156-INCH SOLID ROCKET MOTOR AT ANGLES OF ATTACK FROM -10 DEG. TO 190 DEG.
1254		DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A DOUBLE DELTA WING SPACE SHUTTLE ORBITER (M = 0.6 - 5.0)
1255	CYLINDRICAL	DELTA WING	1	AN INVESTIGATION OF THE LOAD DISTRIBUTION OVER THE SRB AND EXTERNAL TANK OF A 0.004 SCALE MODEL OF THE 049 SPACE SHUTTLE LAUNCH CONFIGURATION
1256	CYLINDRICAL	DELTA WING	1	STATIC STABILITY AND CONTROL EFFECTIVENESS OF A PARAMETRIC LAUNCH VEHICLE
1257				** REDESIGNATED TO PHASE C **
1258		DELTA WING	1	EFFECTIVENESS OF WING-UPPER-SURFACE FLAP AT SUPERSONIC SPEEDS ON 040A DELTA-WING ORBITER
1259	CYLINDRICAL	DELTA WING	1	PRELIMINARY PRESSURE DISTRIBUTIONS ON THE 049 ORBITER. ORBITER IN PRESENCE OF H/O TANK AND ORBITER IN LAUNCH CONFIGURATION
1260	CANARD	DELTA WING	1	ASCENT SHOCK IMPINGEMENT HEATING ON A MDAC SHUTTLE CONFIGURATION, M = 10

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1261	CYLINDRICAL	DELTA WING	1	AN EVALUATION OF ORBITER INDUCED INTERFERENCE HEATING ON THE BOOSTER, ORBITER TANK, AND INTERSTAGE FAIRINGS FOR BOTH LOW AND HIGH-ALPHA RE-ENTRY
1262	CANARD	DELTA WING	1	HEAT TRANSFER TESTS OF THE MCDONNELL-DOUGLAS DELTA WING ORBITER MATED WITH -17A BOOSTER AT MACH NUMBER 8
1262	CANARD	DELTA WING	2	HEAT TRANSFER TESTS OF THE MCDONNELL-DOUGLAS DELTA WING ORBITER AND THE -17A BOOSTER (NOT MATED) AT MACH NUMBER 8
1263	CANARD	DELTA WING	1	ASCENT SHOCK IMPINGEMENT HEATING ON A MDAC SHUTTLE CONFIGURATION, M = 2.3 AND 3.7
1264	DELTA WING	DELTA WING	1	ASCENT HEAT TRANSFER RATE DISTRIBUTION ON THE NR DELTA WING ORBITER AND THE GD/C BOOSTER AT MACH NUMBER OF 8 (MATED)
1264	DELTA WING	DELTA WING	2	ASCENT HEAT TRANSFER RATE DISTRIBUTION ON THE NR DELTA WING ORBITER AND THE GD/C BOOSTER AT MACH NUMBER OF 8 (NOT MATED)
1265	CYLINDRICAL	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE 040A ORBITER-TANK-SRM COMBINATION AT MACH NUMBERS FROM 2.3 TO 4.62
1266		DELTA WING	1	HEAT TRANSFER DISTRIBUTIONS ON THE LMSC 040C AND 040A-L4 DELTA WING ORBITERS (M = 8)
1267	CYLINDRICAL	DELTA WING	1	AERODYNAMIC CHARACTERISTICS OF AN 040A SPACE SHUTTLE LAUNCH CONFIGURATION WITH SIMULATED ROCKET PLUMES AT MACH NUMBERS FROM 0.8 TO 2.2

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONTINUED)**

DMS DR#	BOOSTER CONFIG. I.D.	ORBITER CONFIG. I.D.	VOL. NUM.	REPORT TITLE
1268		DELTA WING	1	STATIC LONGITUDINAL AND LATERAL- DIRECTIONAL STABILITY CHARACTERISTICS OF A 0.01675 SCALE MODEL DOUBLE DELTA WING SPACE SHUTTLE ORBITER AT A MACH NUMBER OF 0.25
1269	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1270		DELTA WING	1	STATIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF A DOUBLE DELTA WING ORBITER CONFIGURATION AT M = 20.3
1270		DELTA WING	2	STATIC AERODYNAMIC CHARACTERISTICS AND CONTROL EFFECTIVENESS OF A DOUBLE DELTA WING ORBITER CONFIGURATION AT M = 20.3 -- FLOW STUDIES
1271	TASK CANCELLED			** DOCUMENT WAS NOT PUBLISHED **
1272	CYLINDRICAL	DELTA WING	1	PERFORMANCE, STATIC STABILITY AND CONTROL EFFECTIVENESS OF A PARAMETRIC SPACE SHUTTLE LAUNCH VEHICLE BOOSTER
1273	CYLINDRICAL	DELTA WING	1	STATIC SURFACE PRESSURES OF THE 0.004 SCALE 049 ORBITER IN THE LAUNCH CONFIGURATION
1274		DELTA WING	1	STATIC STABILITY AND CONTROL EFFECTIVENESS OF THE 040A DELTA WING ORBITER (M = 0.6 TO 4.96)
1275	CYLINDRICAL		1	STABILITY AND CONTROL EFFECTIVENESS AT HIGH AND LOW ANGLES OF ATTACK AND EFFECTS OF VARIATIONS IN ENGINE SHROUD, FIN, AND DRAG PETAL CONFIGURATIONS FOR THE BOEING 0.008899-SCALE PRESSURE-FED BALLISTIC RECOVERABLE BOOSTER, MODEL 979-160

**TABLE 4. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE A/B  
(CONCLUDED)**

DMS DR# -----	BOOSTER CONFIG. I.D. -----	ORBITER CONFIG. I.D. -----	VOL. NUM. -----	REPORT TITLE -----
1276	CYLINDRICAL		1	RE-ENTRY STABILITY IN NOSE-FORWARD AND BASE SHIELD-FORWARD ORIENTATIONS AND THE EFFECTIVENESS OF DRAG DEVICES FOR THE BOEING 0.006944-SCALE BALLISTIC RECOVERABLE BOOSTER. MODEL 979-071
1277		DELTA WING	1	STATIC LONGITUDINAL AND LATERAL-DIRECTIONAL STABILITY CHARACTERISTICS OF A 0.0075 SCALE MODEL DOUBLE DELTA-WING SPACE SHUTTLE ORBITER AT MACH NUMBER OF 10.33
1278	CYLINDRICAL	DELTA WING	1	SHOCK IMPINGEMENT HEATING ON THE MSC 040A-2/156-INCH SRM SPACE SHUTTLE LAUNCH CONFIGURATION, M = 8.0



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2001	128,750	MA5	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF A .01925 SCALE MODEL NR ATP ORBITER AT MACH NUMBERS FROM 1.9 TO 4.63
2002	128,752	LA1	RESULTS OF TRANSONIC TESTS IN THE NASA/LARC 8 FOOT PRESSURE TUNNEL ON A 0.015 SCALE MODEL NR-PRR SPACE SHUTTLE ORBITER
2003	128,754	MA2	HYPersonic AERODYNAMIC CHARACTERISTICS OF NR-ATP ORBITER, ORBITER WITH EXTERNAL TANK AND ASCENT CONFIGURATION
2004	120,082	MA1	LONGITUDINAL AERODYNAMIC CHARACTERISTICS OF LOW ASPECT RATIO WING CONFIGURATIONS IN GROUND EFFECT FOR A MOVING AND STATIONARY GROUND SURFACE
2005	120,070	OA1	AERODYNAMIC STABILITY CONTROL EFFECTIVENESS AND DRAG CHARACTERISTICS OF A SHUTTLE ORBITER CONFIGURATION AT MACH NUMBERS FROM 0.6 TO 4.96
2006	120,088	IA1A	AERODYNAMIC STATIC STABILITY AND CONTROL EFFECTIVENESS OF A PARAMETRIC SHUTTLE LAUNCH CONFIGURATION
2007	128,760	OA4	RESULTS OF INVESTIGATIONS ON A 0.015 SCALE MODEL NORTH AMERICAN ROCKWELL SPACE SHUTTLE ORBITER IN THE NASA/ARC 3.5 FOOT HYPersonic WIND TUNNEL
2008	128,751	MA4	STATIC STABILITY AND PERFORMANCE CHARACTERISTICS OF THE A.T.P. ORBITER AT M=10.3
2009	128,761	OA3	AERODYNAMIC CHARACTERISTICS OF THE ROCKWELL INTERNATIONAL ORBITER OA3 AT MACH NUMBERS FROM 0.6 TO 2.0
2010	120,060	IA1B	DETERMINATION OF THE AERODYNAMIC INTERFERENCE BETWEEN THE SPACE SHUTTLE ORBITER, EXTERNAL TANK, AND SOLID ROCKET BOOSTER ON A 0.004 SCALE ASCENT CONFIGURATION
2011	120,089	MA9F	SPACE SHUTTLE (ATP CONFIGURATION) ABORT STAGING INVESTIGATION
2012	120,090	SA1F	AERODYNAMIC CHARACTERISTICS OF A 162-INCH DIAMETER SOLID ROCKET BOOSTER WITH AND WITHOUT STRAKES

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2013	128,762	IA2	EFFECT OF GASEOUS AND SOLID SIMULATED JET PLUMES ON AN 040A SPACE SHUTTLE LAUNCH CONFIGURATION AT MACH NUMBERS FROM 1.6 TO 2.2
2014	128,753	OA7	RESULTS OF SUPERSONIC TESTS IN THE LARC UNITARY PLAN WIND TUNNEL ON A .015 SCALE MODEL NR-PRR SPACE SHUTTLE ORBITER
2015	120,091 V-01	IA4	AERODYNAMIC RESULTS OF SEPARATION TESTS IN THE VOUGHT AERONAUTICS 4X4FT HSWT ON A .0075 SCALE ROCKWELL INTERNATIONAL-ATP SHUTTLE INTEGRATED VEHICLE
2015	120,091 V-02	IA4	AERODYNAMIC RESULTS OF SEPARATION TESTS ON THE VOUGHT AERONAUTICS 4FT X 4FT HSWT ON A .0075 SCALE ROCKWELL INTERNATIONAL-ATP SHUTTLE INTEGRATED VEHICLE
2016	120,092	OA2	RESULTS OF INVESTIGATIONS ON A 0.0405 SCALE MODEL ATP VERSION OF THE NR-SSV ORBITER IN THE NORTH AMERICAN AERONAUTICAL LABORATORY LOW SPEED WIND TUNNEL
2017	123,851	OA5	RESULTS OF INVESTIGATIONS ON A 0.0405 SCALE MODEL PRR VERSION OF THE NR-SSV ORBITER IN THE NORTH AMERICAN AERONAUTICAL LABORATORY LOW SPEED WIND TUNNEL
2018	128,755	IA3	CROSS WIND LOADS INVESTIGATION OF A .01925 SCALE MODEL OF THE ATP-SSV LAUNCH CONFIGURATION
2019	128,756	OA6	LOW SPEED LONGITUDINAL AND LATERAL STABILITY CHARACTERISTICS OF A PRR SHUTTLE ORBITER CONFIGURATION
2020	128,757	OA9	LOW SPEED INVESTIGATION OF THE PRR PLANFORM WING BOTH IN AND OUT OF GROUND EFFECT
2021	128,758 V-01	OA45	PRESSURE LOADS AND AERODYNAMIC FORCE INFORMATION FOR THE -89A SPACE SHUTTLE ORBITER CONFIGURATION
2021	128,758 V-02	OA45	PRESSURE LOADS AND AERODYNAMIC FORCE INFORMATION FOR THE -89A SPACE SHUTTLE ORBITER CONFIGURATION

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2022	128,759	OA10	AERODYNAMIC CHARACTERISTICS OF THE ROCKWELL INTERNATIONAL -89B SPACE SHUTTLE ORBITER CONFIGURATION
2023	128,763	LA2	STATIC AERODYNAMIC CHARACTERISTICS AND OIL FLOW AND ELECTRON BEAM RESULTS OF A 0.005 SCALE MODEL LANGLEY CONCEPT SPACE SHUTTLE ORBITER(L0-100) AT A MACH NUMBER OF 20.3
2024	128,766	IA7	WIND TUNNEL TEST OF THE 0.019 (040A) JET PLUME SPACE SHUTTLE INTEGRATED VEHICLE IN THE ARC 11-FOOT UNITARY WIND TUNNEL
2025	128,767	SA3F	AERODYNAMIC CHARACTERISTICS OF A 142-INCH DIAMETER SOLID ROCKET BOOSTER WITH AND WITHOUT STRAKES
2026	128,778	IA31F	AERODYNAMIC INVESTIGATIONS ON A 0.004 SCALE MODEL MCR 0074 BASELINE SPACE SHUTTLE LAUNCH VEHICLE AT MACH NO. BETWEEN 0.6 AND 4.96
2027	141,807 V-01	IA32FB	AN INVESTIGATION IN THE NASA MSFC 14-INCH TRISONIC WIND TUNNEL TO DETERMINE THE PRESSURE DISTRIBUTION OVER THE COMPONENTS OF A 0.004 SCALE VERSION OF THE ROCKWELL MCR 0074 BASELINE SHUTTLE ASCENT CONFIGURATION (IA32FB)
2027	141,808 V-02	IA32FB	AN INVESTIGATION IN THE NASA MSFC 14-INCH TRISONIC WIND TUNNEL TO DETERMINE THE PRESSURE DISTRIBUTION OVER THE COMPONENTS OF A 0.004 SCALE VERSION OF THE ROCKWELL MCR 0074 BASELINE SHUTTLE ASCENT CONFIGURATION (IA32F)
2027	141,809 V-03	IA32FB	AN INVESTIGATION IN THE NASA MSFC 14-INCH TRISONIC WIND TUNNEL TO DETERMINE THE PRESSURE DISTRIBUTION OVER THE COMPONENTS OF A 0.004 SCALE VERSION OF THE ROCKWELL MCR 0074 BASELINE SHUTTLE ASCENT CONFIGURATION (IA32F)
2028	134,434 V-01	IA31FB	TRIPLE BALANCE TEST OF THE PRR BASELINE SPACE SHUTTLE CONFIGURATION (TWT 570)
2028	134,436 V-02	IA31FB	TRIPLE BALANCE TEST OF THE PRR BASELINE SPACE SHUTTLE CONFIGURATION (TWT 570)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2029	128,765	OA47	RESULTS OF A STATIC STABILITY AND CONTROL EFFECTIVENESS INVESTIGATION OF A 0.004 SCALE 2A ORBITER IN THE MARSHALL SPACE FLIGHT CENTER TRISONIC WIND TUNNEL (MACH=0.6 - 4.96)
2030	128,768	OA14	AERODYNAMIC CHARACTERISTICS OF VARIOUS AFT-END CONFIGURATIONS OF THE ROCKWELL INTERNATIONAL - 89B SPACE SHUTTLE ORBITER
2031	128,769	LA3	HYPERSONIC PERFORMANCE, STABILITY AND CONTROL CHARACTERISTICS OF A 0.010 SCALE MODEL OF A LANGLEY CONCEPT SPACE SHUTTLE ORBITER
2032	128,794 V-01	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-02	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-03	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-04	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-05	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-06	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2032	128,794 V-07	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-08	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-09	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-10	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-11	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-12	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-13	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-14	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-15	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2032	128,794 V-16	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-17	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2032	128,794 V-18	IA9A,B,C/ OA12A,C	RESULTS OF TESTS OA12 AND IA9 IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS ON AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 2A TO DETERMINE AERODYNAMIC LOADS
2033	128,772	LA4	SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A LANGLEY CONCEPT SPACE SHUTTLE ORBITER AT MACH 1.5 TO 4.63
2034	128,764	LA22	AERODYNAMIC AND FLOW VISUALIZATION STUDIES ON A SPACE SHUTTLE CONCEPT WITH A DOUBLE DELTA WING ORBITER AT A MACH NUMBER OF 20.3
2035	134,077	OH2A/OH2B	THERMAL PROTECTION SYSTEM GAP HEATING RATES OF THE ROCKWELL INTERNATIONAL FLAT PLATE HEAT TRANSFER MODEL
2036	128,776	LA5	AERODYNAMIC AND FLOW-VISUALIZATION STUDIES ASSOCIATED WITH VARIATIONS IN THE GEOMETRY OF THE FORWARD PORTION OF IRREGULAR PLANFORM WINGS AT A MACH NUMBER OF 20.3
2037	134,405	OA84	RESULTS OF INVESTIGATIONS ON A 0.015-SCALE 140A/B CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL (49-0) IN THE LTV 4 BY 4-FOOT HIGH SPEED WIND TUNNEL
2038	128,793	OA16	RESULTS OF LOW SPEED WIND TUNNEL TESTS ON A .0405 SCALE MODEL ROCKWELL SPACE SHUTTLE ORBITER TESTED BOTH IN FREE AIR AND IN THE PRESENCE OF A GROUND PLANE

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2039	134,071	IA6A	RESULTS OF WIND TUNNEL TESTS AT MACH 5 ON THE .004 SCALE MODEL 2A CONFIGURATION SPACE SHUTTLE TO DETERMINE PROXIMITY EFFECTS AND ORBITER CONTROL EFFECTIVENESS DURING ORBITER/EXTERNAL TANK ABORT SEPARATION
2040	128,773	LA6	SURFACE ROUGHNESS EFFECTS ON THE TRANSONIC AERODYNAMICS OF THE ROCKWELL INTERNATIONAL 089B-139 ORBITER
2041	128,781	LA7A	TRANSONIC AERODYNAMIC CHARACTERISTICS ASSOCIATED WITH VARIATIONS IN THE GEOMETRY OF THE FORWARD PORTION OF IRREGULAR PLANFORM WINGS
2042	134,087	IA52	RESULTS OF FLOW VISUALIZATION STUDIES IN THE NASA/MSFC 14 X 14 INCH TRANSONIC WIND TUNNEL ON A 0.004 SCALE MODEL (34-0) SPACE SHUTTLE ORBITER AND INTEGRATED VEHICLE
2043	128,770	LA16	HEAT TRANSFER DATA TO CAVITIES BETWEEN SIMULATED RSI TILES AT MACH 8
2044	128,786	OA11A	RESULTS OF INVESTIGATIONS ON A 0.015-SCALE MODEL 2A CONFIGURATION OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE NASA/AMES RESEARCH CENTER 3.5 FOOT HYPERSONIC WIND TUNNEL
2045	128,779	OA18	RESULTS OF INVESTIGATIONS (OA1B) OF A 0.0405 SCALE MODEL OF THE 2A AND 3 SPACE SHUTTLE ORBITER CONFIGURATIONS IN THE NORTH AMERICAN AERONAUTICAL LABORATORY LOW SPEED WIND TUNNEL AT M = 0.26 AND 0.16
2046	128,776	LA17	AERODYNAMIC STABILITY AND CONTROL CHARACTERISTICS OF A LANGLEY CONCEPT SPACE SHUTTLE ORBITER (L0-100) AT MACH NUMBERS OF 0.35 TO 1.2
2047	134,086	LA31	EFFECT OF WALL TO TOTAL TEMPERATURE RATIO VARIATION ON HEAT TRANSFER

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2048	134,104	1A12B	WIND TUNNEL TEST OF THE 0.019 (2A CONFIGURATION) JET PLUME SPACE SHUTTLE INTEGRATED VEHICLE IN THE ARC 9- BY 7-FOOT UNITARY WIND TUNNEL
2049	128,771	OH40	AERODYNAMIC HEATING OF A SPACE SHUTTLE DOUBLE DELTA WING ORBITER AT MACH NUMBER 8.0
2050	128,790	OA43	WIND TUNNEL TEST OF THE 0.15-SCALE ROCKWELL INTERNATIONAL SPACE SHUTTLE VEHICLE ORBITER IN THE AMES 6- BY 6-FOOT SUPERSONIC WIND TUNNEL
2051	128,774	SA5F	AERODYNAMIC CHARACTERISTICS OF A 142-INCH DIAMETER SOLID ROCKET BOOSTER (CONFIGURATIONS 89B AND 139)
2052	128,791	LA10	SUPERSONIC AERODYNAMIC CHARACTERISTICS ASSOCIATED WITH VARIATIONS IN THE GEOMETRY OF THE FORWARD PORTION OF IRREGULAR PLANFORM WINGS
2053	128,792 V-01	OA21B	EXPERIMENTAL INVESTIGATIONS OF AN 0.0405 SCALE SPACE SHUTTLE CONFIGURATION 3 ORBITER TO DETERMINE SUBSONIC STABILITY CHARACTERISTICS (OA21)
2053	128,792 V-02	OA21B	EXPERIMENTAL INVESTIGATIONS OF AN 0.0405 SCALE SPACE SHUTTLE CONFIGURATION 3 ORBITER TO DETERMINE SUBSONIC STABILITY CHARACTERISTICS (OA21)
2054	128,796	LA8A/LA8B	SURFACE ROUGHNESS EFFECTS ON THE SUPERSONIC AERODYNAMICS OF THE ROCKWELL INTERNATIONAL 089B-139 ORBITER
2055	128,780 V-01	OA48	STATIC STABILITY AND CONTROL EFFECTIVENESS OF MODELS 12-0 AND 34-0 OF THE VEHICLE 3 CONFIGURATIONS
2055	128,780 V-02	OA48	STATIC STABILITY AND CONTROL EFFECTIVENESS OF MODELS 12-0 AND 34-0 OF THE VEHICLE 3 CONFIGURATIONS
2055	128,780 V-03	OA48	STATIC STABILITY AND CONTROL EFFECTIVENESS OF MODELS 12-0 AND 34-0 OF THE VEHICLE 3 CONFIGURATIONS
2056	128,782	LA9	SURFACE ROUGHNESS EFFECTS ON THE SUBSONIC AERODYNAMICS OF THE ROCKWELL INTERNATIONAL 089B-139 ORBITER



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2057	134,411	OA44	RESULTS OF AN EXPERIMENTAL AERODYNAMIC INVESTIGATION TO OBTAIN STATIC STABILITY AND CONTROL CHARACTERISTICS OF THE SSV CONFIGURATIONS 2A(VL70-000089B) MODEL 1 AND 3 (VL70-000139B) MODEL 2 ORBITERS AT MACH NUMBERS OF 2.5, 3.9, AND 4.6 IN THE-NASA LARC 4X4-FOOT UPWT (OA44)
2058	134,079	OA17	RESULTS OF THE 0.015 SCALE SPACE SHUTTLE VEHICLE ORBITER TEST (OA17) IN THE NASA LOW TURBULENCE PRESSURE TUNNEL
2059	128,798	OA11B	INVESTIGATIONS OF THE SPACE SHUTTLE ORBITER 2A CONFIGURATION 0.015-SCALE MODEL IN THE NASA AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL AT MACH NUMBERS 5, 7 AND 10
2060	134,091	OA58	RESULTS OF AN AERODYNAMIC FORCE AND MOMENT INVESTIGATION OF AN 0.015-SCALE CONFIGURATION 3 SPACE SHUTTLE ORBITER IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (OA58)
2061	128,789	OA68	SUBSONIC, TRANSONIC, AND SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF THE -147B SPACE SHUTTLE ORBITER
2062	134,117 V-01	IA13	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST CONDUCTED IN THE AEDC 40X 40 INCH TUNNEL A FACILITY ON THE ROCKWELL INTERNATIONAL LAUNCH CONFIGURATION 3 INTEGRATED VEHICLE
2062	134,118 V-02	IA13	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST CONDUCTED IN THE AEDC 40X 40 INCH TUNNEL A FACILITY ON THE ROCKWELL INTERNATIONAL LAUNCH CONFIGURATION 3 INTEGRATED VEHICLE
2062	141,801 V-03	IA13	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST CONDUCTED IN THE AEDC 40X 40 INCH TUNNEL A FACILITY ON THE ROCKWELL INTERNATIONAL LAUNCH CONFIGURATION 3 INTEGRATED VEHICLE
2063	128,788	IA37/IA48	RESULTS OF TESTS IN THE MSFC 14X14 INCH TRISONIC WIND TUNNEL ON A 0.004 SCALE MODEL OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE VEHICLE 3, (INTEGRATED CONFIGURATION)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2064	141,814 V-01	IA36	WIND TUNNEL TEST OF THE 0.019 SCALE SPACE SHUTTLE INTEGRATED VEHICLE(MODEL 14-0TS) IN THE CALSPAN 8-FOOT TRANSONIC WIND TUNNEL (IA36)
2064	141,816 V-02	IA36	WING TUNNEL TEST OF THE 0.019 SCALE SPACE SHUTTLE INTEGRATED VEHICLE(MODEL 14-0TS) IN THE CALSPAN 8-FOOT TRANSONIC WIND TUNNEL (IA36)
2065	141,518 V-01	IA12C	WIND TUNNEL TESTS OF AN 0.019-SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA AMES 8 X 7-FOOT UNITARY WIND TUNNEL(IA12C)
2065	141,519 V-02	IA12C	WIND TUNNEL TESTS OF AN 0.019-SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA AMES 8 X 7-FOOT UNITARY WIND TUNNEL(IA12C)
2065	141,520 V-03	IA12C	WIND TUNNEL TESTS OF AN 0.019-SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA AMES 8 X 7-FOOT UNITARY WIND TUNNEL(IA12C)
2066	128,783	LA11	HYPERSONIC PERFORMANCE, STABILITY AND CONTROL CHARACTERISTICS OF A 0.0075 SCALE MODEL ROCKWELL INTERNATIONAL 089-139 ORBITER CONFIGURATION
2067	128,777	OS2	FLUTTER TESTS (052) OF THE SHUTTLE ORBITER FIN/RUDDER MODEL 24-0
2068	128,797	OA71A	EFFECTS OF THE AIR BREATHING PROPULSION SYSTEM ON SPACE SHUTTLE ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS (OA71A)
2069	134,074	MA7	EFFECTS OF REACTION CONTROL SYSTEM JET-FLOW FIELD INTERACTIONS ON A 0.015 SCALE MODEL SPACE SHUTTLE ORBITER AERODYNAMIC CHARACTERISTICS
2070	128,787	LA23	EFFECT OF GASEOUS AND SOLID SIMULATED JET PLUMES ON AN 040A SPACE SHUTTLE LAUNCH CONFIGURATION AT MACH NUMBERS FROM 1.6 TO 2.2
2071	128, 799	OA73	RESULTS OF TESTS OF 0.010- AND 0.015 SCALE MODELS OF SPACE SHUTTLE ORBITER CONFIGURATIONS 3 AND 3A IN THE AMES RESEARCH CENTER 3 5-FOOT HYPERSONIC WIND TUNNEL (OA23)
2072	134,072	IA31FC	MISALIGNMENT STUDIES ON SPACE SHUTTLE INTEGRATED VEHICLE

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2073	134,070	OA70	EFFECTS OF REACTION CONTROL SYSTEM JET SIMULATION ON THE STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE SPACE SHUTTLE MODEL TESTED IN THE LANGLEY RESEARCH CENTER UNITARY PLAN WIND TUNNEL
2074	134,414	OA57A	EFFECTS OF THE AIR BREATHING ENGINE PLUMES ON SSV ORBITER SUBSONIC WING PRESSURE DISTRIBUTIONS
2075	128,784	OH41	INVESTIGATION OF CONFIGURATION EFFECTS ON ENTRY HEATING DISTRIBUTIONS AT MACH = 8.0 (OH41)
2076	128,785	OH41A	INVESTIGATION OF CONFIGURATION EFFECTS ON ENTRY HEATING DISTRIBUTIONS AT MACH = 8.0 (OH41A)
2077	134,095 V-01	IA29/OA63	RESULTS OF TESTS OA63 AND IA29 ON AN 0.015-SCALE MODEL OF THE SPACE SHUTTLE CONFIGURATION 140 A/B IN THE NASA/ARC 6- BY 6-FOOT TRANSONIC WIND TUNNEL
2077	134,099 V-02	IA29/OA63	RESULTS OF TESTS OA63 AND IA29 ON AN 0.015 SCALE MODEL OF THE SPACE SHUTTLE CONFIGURATION 140 A/B IN THE NASA/ARC 6- BY 6-FOOT TRANSONIC WIND TUNNEL
2077	134,100 V-03	IA29/OA63	RESULTS OF TESTS OA63 AND IA29 ON AN 0.015 SCALE MODEL OF THE SPACE SHUTTLE CONFIGURATION 140 A/B IN THE NASA/ARC 6- BY 6-FOOT TRANSONIC WIND TUNNEL
2078	128,795	IA10	WIND TUNNEL TEST OF THE 0.010-SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (IA10)
2079	134,083	LA15	EFFECTS OF SURFACE ROUGHNESS ON THE AERODYNAMIC CHARACTERISTICS OF THE MODIFIED 089 B SHUTTLE ORBITER AT MACH 6 (LA15)
2080	134,416 V-01	OA57B	EFFECTS OF AIR BREATHING ENGINE PLUMES ON SSV ORBITER SUBSONIC WING PRESSURE DISTRIBUTION
2080	134,417 V-02	OA57B	EFFECTS OF AIR BREATHING ENGINE PLUMES ON SSV ORBITER SUBSONIC WING PRESSURE DISTRIBUTION
2081	141,580 V-01	OA69	LANDING PRESSURE LOADS OF THE -140 A/B SPACE SHUTTLE ORBITER DETERMINED IN THE NRLAD LOW SPEED WIND TUNNEL (OA69)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2081	141,581 V-02	OA69	LANDING PRESSURE LOADS OF THE -140 A/B SPACE SHUTTLE ORBITER DETERMINED IN THE NRLAD LOW SPEED WIND TUNNEL (OA69)
2082	128,800	OA73	EFFECTS OF REACTION CONTROL SYSTEM JET SIMULATION ON THE STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE SPACE SHUTTLE ORBITER MODEL IN THE AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL
2083	134,081	OA20A	RESULTS OF INVESTIGATIONS (OA20) ON A 0.015-SCALE 140 A/B CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL IN THE NASA/LANGLEY RESEARCH CENTER UNITARY PLAN WIND TUNNEL
2084	134,443 V-01	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL OR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	134,444 V-02	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL OR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	143,445 V-03	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	143,446 V-04	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	143,447 V-05	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2084	143,448 V-06	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	143,449 V-07	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	143,449 V-08	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	141,501 V-09	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	141,502 V-10	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2084	141,503 V-11	IA14A	AIRLOADS INVESTIGATIONS OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH RANGE 0.6 TO 1.4 (IA14A)
2085	167,344	OH10/IH2	REPORT OF PRESSURE DISTRIBUTION TESTS OF THE 0.010-SCALE SPACE SHUTTLE VEHICLE MODEL (26-0TS) IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (TESTS OH10 AND IH2)
2086	134,078	OA71C	EFFECTS OF THE SIX ENGINE AIR BREATHING PROPULSION SYSTEM ON SPACE SHUTTLE ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2087	134,116	SA10F	EFFECT OF ENGINE SHROUD CONFIGURATION ON THE STATIC AERODYNAMIC CHARACTERISTICS OF A 0.00563 SCALE 142-INCH DIAMETER SOLID ROCKET BOOSTER
2088	134,105	SA2FA/SA2FB	AERODYNAMIC CHARACTERISTICS OF A 142-INCH DIAMETER SOLID ROCKET BOOSTER (CONFIGURATION 139)
2089	134,082	OA25	RESULTS OF INVESTIGATIONS ON AN 0.015-SCALE CONFIGURATION 140A/B SPACE SHUTTLE ORBITER MODEL (49-0) IN THE NASA/LANGLEY RESEARCH CENTER 8-FOOT TRANSONIC PRESSURE TUNNEL (OA25)
2090	134,080	LA8C	SUPERSONIC PERFORMANCE, STABILITY AND CONTROL CHARACTERISTICS OF A 0.01875 SCALE MODEL ROCKWELL INTERNATIONAL 089B-139B ORBITER CONFIGURATION (LA8C)
2091	141,512	LA7B	SUBSONIC AND TRANSONIC AERODYNAMIC CHARACTERISTICS ASSOCIATED WITH VARIATIONS IN THE GEOMETRY OF THE FORWARD PORTION OF IRREGULAR PLANFORM WINGS ON A .01875 SCALE LO-100 LANGLEY CONCEPT SPACE SHUTTLE ORBITER IN THE LANGLEY 8-FOOT TPT (LA7B)
2092	TM-X71968	OA72	HYPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.004 SCALE MODEL (34-0) ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER VEHICLE 3 CONFIGURATION (OA-72)
2093	134,090	IA37B	EFFECT OF EXTERNAL TANK NOSE SHAPE ON THE ROCKWELL INTERNATIONAL SPACE SHUTTLE
2094	134,073	OS1	FLUTTER TESTS (OS1) OF THE 0.02-SCALE ORBITER WING ELEVON SEMI-SPAN MODEL 23-0
2095	134,404	OA49	AN INVESTIGATION OF THE STABILITY AND CONTROL CHARACTERISTICS OF THE VEHICLE 4 CONFIGURATION
2096	134,101	OH13	HEAT TRANSFER TESTS OF AN 0.006-SCALE THIN SKIN SPACE SHUTTLE THERMOCOUPLE MODEL (41-0) IN THE LANGLEY RESEARCH CENTER VARIABLE DENSITY TUNNEL AT M=8

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2097	134,102	OA62A	CONTINUED INVESTIGATIONS IN THE NAAL LOW SPEED WIND TUNNEL INTO THE EFFECTS OF THE AIR BREATHING PROPULSION SYSTEM ON ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS (OA62A)
2098	134,096	IH15	HEAT TRANSFER TESTS OF A 0.006-SCALE THIN-SKIN SPACE SHUTTLE MODEL (41-OTS) IN THE AMES 3.5-FOOT HWT AT M=5.3
2099	134,419 V-01	OH4B	DATA REPORT FOR TESTS ON THE HEAT TRANSFER EFFECTS OF THE 0.0175-SCALE ROCKWELL INTERNATIONAL SPACE SHUTTLE VEHICLE MODEL 22-0T IN THE AEDC 50-INCH B WIND TUNNEL
2099	134,438 V-02	OH4B	DATA REPORT FOR TESTS ON THE HEAT TRANSFER EFFECTS OF THE 0.0175-SCALE ROCKWELL INTERNATIONAL SPACE SHUTTLE VEHICLE MODEL 22-0T IN THE AEDC 50-INCH B WIND TUNNEL
2099	134,439 V-03	OH4B	DATA REPORT FOR TESTS ON THE HEAT TRANSFER EFFECTS OF THE 0.0175-SCALE ROCKWELL INTERNATIONAL SPACE SHUTTLE VEHICLE MODEL 22-0T IN THE AEDC 50-INCH B WIND TUNNEL
2100	134,075	OH3A/OH3B	PHASE CHANGE PAINT TESTS ON ROCKWELL ORBITER/TANK AND ORBITER ALONE CONFIGURATIONS
2101	134,076	OH42A/B/C	HEAT TRANSFER PHASE CHANGE PAINT TEST (OH-42) OF A ROCKWELL INTERNATIONAL SSV ORBITER IN THE NASA/LRC MACH 8 VARIABLE DENSITY WIND TUNNEL
2102	134,089	IA15	RESULTS OF INVESTIGATIONS ON A 0.010-SCALE MODEL OF THE CONFIGURATION 3 SPACE SHUTTLE ORBITER AND EXTERNAL TANK IN THE NASA/AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (IA15)
2103	134,094	IA62F	WIND TUNNEL TEST RESULTS OF FAIRINGS ON A 0.004 SCALE MODEL ROCKWELL SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC CHARACTERISTICS AT MACH NUMBERS FROM 0.6 TO 4.96 (IA62F)
2104	134,112 V-01	OA62B	INVESTIGATION OF SPACE SHUTTLE ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS IN THE NAAL LOW SPEED WIND TUNNEL (OA62B)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2104	134,113 V-02	OA62B	INVESTIGATION OF SPACE SHUTTLE ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS IN THE NAAL LOW SPEED WIND TUNNEL (OA62B)
2105	144,594	IH17	TRANSITION HEATING RATES OBTAINED ON A MATED AND ISOLATED 0.006 SCALE MODEL (41-0T) SPACE SHUTTLE ORBITER AND EXTERNAL TANK IN THE NASA/LARC VARIABLE DENSITY HYPERSONIC TUNNEL
2106	TM-X72630	LA14A/B	SUPERSONIC DYNAMIC STABILITY DERIVATIVES OF A MODIFIED 089B SHUTTLE ORBITER
2107	TM-X72631	LA20	SUBSONIC AND TRANSONIC DYNAMIC STABILITY DERIVATIVES OF A MODIFIED 089B SHUTTLE ORBITER
2108	134,084	IA35/OA64	RESULTS OF TESTS (OA64 AND IA35) OF AN 0.015-SCALE MODEL (36-0TS) OF THE SPACE SHUTTLE CONFIGURATION 140A/B IN THE NASA/LARC UNITARY PLAN WIND TUNNEL
2109	141,527	OH45	ENTRY HEAT TRANSFER TESTS OF THE 0.006-SCALE SPACE SHUTTLE (-147B) ORBITER MODEL (50-0) IN THE LANGLEY RESEARCH CENTER FREON TUNNEL AT MACH 6 (OH45)
2110	144,589	IH18	HEAT TRANSFER TESTS OF AN 0.006-SCALE THIN-SKIN SPACE SHUTTLE THERMOCOUPLE MODEL (41-0T) IN THE LANGLEY RESEARCH CENTER FREON TUNNEL AT M = 6 (IH18)
2111	134,435	SA26F	REENTRY AERODYNAMIC CHARACTERISTICS OF A SPACE SHUTTLE SOLID ROCKET BOOSTER MODEL 449 TESTED IN MSFC 14 X 14 INCH TWT
2112	134,401	IA57	AERODYNAMIC RESULTS OF WIND TUNNEL SEPARATION TESTS ON A 0.01-SCALE MODEL (32-0TS) SPACE SHUTTLE INTEGRATED VEHICLE (IA57)
2113	134,111	DA85	EFFECTS OF REACTION CONTROL SYSTEM JET FLOW FIELD INTERACTIONS ON THE AERODYNAMIC CHARACTERISTICS OF A 0.010 SCALE SPACE SHUTTLE ORBITER MODEL IN THE LANGLEY RESEARCH CENTER 31-INCH CFHT
2114	134,098	OA86	AERODYNAMIC INVESTIGATIONS INTO VARIOUS LOW SPEED L/D IMPROVEMENT DEVICES ON THE 140A/B SPACE SHUTTLE ORBITER CONFIGURATION IN THE RI NAAL WIND TUNNEL (OA86)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2115	134,085	OA87	RESULTS OF INVESTIGATIONS ON A 0.015-SCALE MODEL (49-0) OF THE SPACE SHUTTLE ORBITER IN THE NASA/AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (OA87)
2116	134,888	OA91	EFFECT OF THE SIX ENGINE AIR BREATHING PROPULSION SYSTEM ON SPACE SHUTTLE ORBITER SUBSONIC AND TRANSONIC STABILITY AND CONTROL CHARACTERISTICS (OA91)
2117	147,617	OH14	TRANSITION HEATING RATES DETERMINED ON A 0.006 SCALE SPACE SHUTTLE ORBITER MODEL (NO. 50-0) IN THE NASA/LARC MACH 8 VARIABLE DENSITY WIND TUNNEL TEST (OH14)
2118	134,108	IA41	RESULTS OF TRANSONIC WIND TUNNEL TESTS ON AN 0.015 SCALE SPACE SHUTTLE MATED VEHICLE MODEL(67-OTS) IN THE LARC 8-FOOT TPT (IA41)
2119	134,109	IA42A/IA428	SUPERSONIC TESTS OF AN 0.015-SCALE SPACE SHUTTLE MATED VEHICLE MODEL (67-OTS) IN THE LARC UPWT TO OBTAIN AERODYNAMIC FORCE DATA
2120	134,426	OA106	WIND TUNNEL TESTS OF AN 0.015-SCALE CONFIGURATION 140A/B SPACE SHUTTLE ORBITER MODEL (67-0) IN THE NASA/LRC 8-FOOT TPT TO OBTAIN TRANSONIC AERODYNAMIC FORCE DATA (OA106)
2121	TASK CANCELLED	LA38A	** DOCUMENT WAS NOT PUBLISHED **
2122	134,424	IA69	INVESTIGATION OF SPACE SHUTTLE LAUNCH VEHICLE EXTERNAL TANK NOSE CONFIGURATION EFFECTS (MODEL 67-OTS) IN THE ROCKWELL INTERNATIONAL 7- BY 7-FOOT TRISONIC WIND TUNNEL (IA69)
2123	141,504	IA53	RESULTS FROM INVESTIGATIONS IN THE NASA/MSFC TWT ON A 0.004 SCALE MODEL SPACE SHUTTLE LAUNCH VEHICLE (MODEL 13P-OTS) TO DETERMINE GAS SUPPLY STRUT EFFECT ON MODEL PRESSURE ENVIRONMENT (IA53)
2124	134,093	IA16/OA26	RESULTS OF TESTS OA26 AND IA16 IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL ON A 0.015 SCALE MODEL (36-OTS) OF THE SPACE CONFIGURATION 140A/B TO OBTAIN PRESSURES FOR VENTING ANALYSIS

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2125	134,409	OA88	HYPersonic STABILITY AND CONTROL CHARACTERISTICS AND REYNOLDS NUMBER EFFECTS OF THE ROCKWELL SSV 140 A/B ORBITER CONFIGURATION
2126	TASK CANCELLED	LA25	** DOCUMENT WAS NOT PUBLISHED **
2127	TM-X71954	LA35	REYNOLDS NUMBER EFFECTS AT MACH NUMBER 10.3 ON AERODYNAMIC CHARACTERISTICS OF .01 SCALE 139-B ORBITER
2128	134,114 V-01	OA53A	INVESTIGATIONS ON AN 0.030-SCALE SPACE SHUTTLE VEHICLE CONFIGURATION 140A/B ORBITER MODEL IN THE AMES RESEARCH CENTER 11 BY 11-FOOT SUPERSONIC WIND TUNNEL (OA53A)
2128	134,115 V-02	OA53A	INVESTIGATIONS ON AN 0.030-SCALE SPACE SHUTTLE VEHICLE CONFIGURATION 140A/B ORBITER MODEL IN THE AMES RESEARCH CENTER 11-BY 11-FOOT SUPERSONIC WIND TUNNEL (OA53A)
2129	141,522 V-01	IA14B	AIRLOADS INVESTIGATION OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 9- BY 7-FOOT UNITARY PLAN WIND TUNNEL FOR MACH 1.55 AND 2.2 (IA14B)
2129	141,523 V-02	IA14B	AIRLOADS INVESTIGATION OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B LAUNCH CONFIGURATION (MODEL 47-0TS) IN THE ARC 9- BY 7-FOOT UNITARY PLAN WIND TUNNEL FOR MACH 1.55 AND 2.2 (IA14B)
2130	141,529	OA22A	AIRLOADS INVESTIGATION OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 140A/B ORBITER CONFIGURATION (MODEL 47-0) IN THE ARC 11-FOOT UNITARY PLAN WIND TUNNEL FOR MACH 0.6 AND 0.9 (OA22A)
2131	141,530	OA22B	AIRLOADS INVESTIGATION OF AN 0.030-SCALE MODEL OF THE SPACE SHUTTLE 140A/B ORBITER CONFIGURATION (MODEL 47-0) IN THE ARC 9- BY 7-FOOT UNITARY PLAN WIND TUNNEL FOR MACH 1.55 AND 2.2 (OA22B)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2132	141,535	LA42	RESULTS OF DYNAMIC STABILITY TESTS CONDUCTED ON A .012 SCALE MODIFIED 089 B SHUTTLE ORBITER IN THE 2AEDC-VKF TUNNEL B AT A MACH NUMBER OF 8.0 (LA42)
2133	134,110	IA58	RESULTS OF TESTS IN THE NASA/LARC 31-INCH CFHT ON AN 0.010-SCALE MODEL (32-0T) OF THE SPACE SHUTTLE CONFIGURATION 3 TO OBTAIN HYPERSONIC AERODYNAMIC CHARACTERISTICS FOR SECOND STAGE OPERATION DURING NOMINAL BOOST AND THE ABORT RTLS MODE
2134 R-01	134,429	OA77/OA78	RESULTS OF INVESTIGATIONS (OA77 AND OA78) ON AN 0.015-SCALE 140A/B CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 49-0 IN THE AEDC VKF B AND C WIND TUNNELS
2135	TASK CANCELLED	LA13	** DOCUMENT WAS NOT PUBLISHED **
2136	141,514 V-01	IH3	RESULTS OF HEAT TRANSFER TESTS OF AN 0.0175-SCALE SPACE SHUTTLE VEHICLE MODEL 22 OTS IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (IH3)
2136	141,515 V-02	IH3	RESULTS OF HEAT TRANSFER TESTS OF AN 0.0175-SCALE SPACE SHUTTLE VEHICLE MODEL 22 OTS IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (IH3)
2136	141,516 V-03	IH3	RESULTS OF HEAT TRANSFER TESTS OF AN 0.0175-SCALE SPACE SHUTTLE VEHICLE MODEL 22 OTS IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (IH3)
2136	141,517 V-04	IH3	RESULTS OF HEAT TRANSFER TESTS OF AN 0.0175-SCALE SPACE SHUTTLE VEHICLE MODEL 22 OTS IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (IH3)
2137 R-01	134,103 V-01	IA60	RESULTS OF TESTS IN THE NASA/LARC 31-INCH CFHT ON A 0.01-SCALE MODEL (32-0T) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE THE RCS JET FLOWFIELD INTERACTION EFFECTS ON AERODYNAMIC CHARACTERISTICS(IA60/OA105) VOLUME 1 OF 2
2137	134,106 V-02	OA105	RESULTS OF TESTS IN THE NASA/LARC 31-INCH CFHT ON A 0.01-SCALE MODEL (32-0T) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE THE RCS JET FLOWFIELD INTERACTION EFFECTS ON AERODYNAMIC CHARACTERISTICS(IA60/OA105) VOLUME 2 OF 2

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2138	144,608 V-01	IH4	AEROHEATING(PRESSURE) CHARACTERISTICS OF A 0.010-SCALE VERSION OF THE VEHICLE 3 SPACE SHUTTLE CONFIGURATION(26-0TS) IN THE LANGLEY RESEARCH CENTER 4-FOOT WIND TUNNEL(IH4)
2138	144,609 V-02	IH4	AEROHEATING(PRESSURE) CHARACTERISTICS OF A 0.010-SCALE VERSION OF THE VEHICLE 3 SPACE SHUTTLE CONFIGURATION(26-0TS) IN THE LANGLEY RESEARCH CENTER 4-FOOT WIND TUNNEL(IH4)
2138	144,610 V-03	IH4	AEROHEATING(PRESSURE) CHARACTERISTICS OF A 0.010-SCALE VERSION OF THE VEHICLE 3 SPACE SHUTTLE CONFIGURATION(26-0TS) IN THE LANGLEY RESEARCH CENTER 4-FOOT WIND TUNNEL(IH4)
2138	144,611 V-04	IH4	AEROHEATING(PRESSURE) CHARACTERISTICS OF A 0.010-SCALE VERSION OF THE VEHICLE 3 SPACE SHUTTLE CONFIGURATION(26-0TS) IN THE LANGLEY RESEARCH CENTER 4-FOOT WIND TUNNEL(IH4)
2139	134,407	OA118	EFFECT OF ELEVON GAP CONFIGURATIONS ON THE LONGITUDINAL AND LATERAL/DIRECTIONAL STABILITY AND CONTROL EFFECTIVENESS OF THE 43-0 SPACE SHUTTLE ORBITER (1A60/OA105)
2140	134,408	OA37	INVESTIGATION OF SPACE SHUTTLE ORBITER SUBSONIC STABILITY AND CONTROL CHARACTERISTICS AND DETERMINATION OF CONTROL SURFACE HINGE MOMENTS IN THE ROCKWELL INTERNATIONAL LOW SPEED WIND TUNNEL (OA37)
2141	141,53A	OH11	RESULTS OF TESTS OF A ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER (-139 CONFIGURATION) 0.0175-SCALE MODEL (N0.29-0) IN THE AEDC TUNNEL.F TO DETERMINE HYPERSONIC HEATING EFFECTS (OH11)
2142	134,402	FA4	DETERMINATION OF AERODYNAMIC STABILITY AND DRAG OF THE TITAN SRM DURING ENTRY
2143	144,587	1A61A	AERODYNAMIC RESULTS OF WIND TUNNEL TESTS ON AN 0.010-SCALE MODEL (32-0TS) SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC VKF 40-INCH SUPERSONIC WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2144	134,427	IA68	AN INVESTIGATION OF THE SUPPORT INTERFERENCE EFFECTS OF THE SSV MODEL 13P-OTS IN THE TRANSONIC AND SUPERSONIC FLOW REGIMES
2145	134,420	TA1F	AN INVESTIGATION TO DETERMINE THE STATIC STABILITY DURING RE-ENTRY OF THE 0.003-SCALE MCR 0200 BASELINE SPACE SHUTTLE EXTERNAL TANK MODEL
2146	134,092	IS4	FLUTTER TESTS (IS4) OF THE 0.0125-SCALE SHUTTLE REFLECTION PLANE MODEL 30-OTS IN THE LANGLEY RESEARCH CENTER 26-INCH TRANSONIC BLOWDOWN TUNNEL TEST NO. 547
2147	134,097	OA20C	RESULTS OF INVESTIGATIONS (OA20C) ON AN 0.015-SCALE CONFIGURATION 140A/B SPACE SHUTTLE VEHICLE ORBITER MODEL (49-0) IN THE NASA/LANGLEY RESEARCH CENTER UNITARY PLAN WIND TUNNEL
2148	134,440 V-01	IH20	HYPERSONIC AEROHEATING TEST OF SPACE SHUTTLE VEHICLE CONFIGURATION 3 (MODEL 22-0TS) IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL(IH-20)
2148	134,441 V-02	IH20	HYPERSONIC AEROHEATING TEST OF SPACE SHUTTLE VEHICLE CONFIGURATION 3 (MODEL 22-0TS) IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL(IH-20)
2149	141,805	OA90	RESULTS OF INVESTIGATIONS ON A 0.010-SCALE 140A/B CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 72-0 IN THE NASA/LANGLEY RESEARCH CENTER CONTINUOUS FLOW HYPERSONIC TUNNEL (OA90)
2150	141,511	SA25F	AN INVESTIGATION OF HIGH MACH NUMBER STATIC STABILITY CHARACTERISTICS FOR A LARGE SCALE SOLID ROCKET BOOSTER
2151	141,815	OH6	RESULTS OF AERODYNAMIC HEAT TRANSFER TESTS OF A 0.0175-SCALE MODEL OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER 139 (MODEL NUMBER 22-0) IN THE NASA/AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (TEST OH6)
2152 R-01	134,423	OA81	RESULTS OF AN INVESTIGATION OF HYPERSONIC VISCOUS INTERACTION EFFECTS ON AN 0.01 SCALE SPACE SHUTTLE ORBITER S1-0 MODEL IN THE AEDC-VKF HYPERVELOCITY WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2153	151,377	IH1	INVESTIGATION OF THE HEAT TRANSFER EFFECTS ON THE 22-0TS 0.0175- SCALE THIN SKIN THERMOCOUPLE MODEL (VEHICLE 3 CONFIGURATION)
2154	134,437	OH4A	HEAT TRANSFER TESTS OF A 0.0175-SCALE SPACE SHUTTLE ORBITER MODEL (29-0) TO DETERMINE THE EFFECT OF SURFACE TEMPERATURE ON BOUNDARY LAYER TRANSITION AT MACH 8.0 IN THE AEDC VKF TUNNEL B (TEST OH4A)
2155	134,406	OA110	STABILITY AND CONTROL CHARACTERISTICS FOR THE INNER MOLD LINE CONFIGURATION OF SPACE SHUTTLE ORBITER(OA110)
2156	141,797 V-01	IA17A	RESULTS OF AN EXTERNAL TANK SEPARATION TEST IN THE AEDC/VKF TUNNEL BON AN 0.010 SCALE REPLICA OF THE SPACE SHUTTLE VEHICLE (MODEL 52-0T)IA17A
2156	141,798 V-02	IA17A	RESULTS OF AN EXTERNAL TANK SEPARATING TEST IN THE AEDC/VKF TUNNEL BON AN 0.010 SCALE REPLICA OF THE SPACE SHUTTLE VEHICLE (MODEL 52-0T)IA17A
2156	141,799 V-03	IA17A	RESULTS OF AN EXTERNAL TANK SEPARATION TEST IN THE AEDC/VKF TUNNEL BON AN 0.010 SCALE REPLICA OF THE SPACE SHUTTLE VEHICLE (MODEL 52-0T)IA17A
2157	141,822	IH19	HEAT TRANSFER TESTS OF AN 0.006-SCALE THIN SKIN SPACE SHUTTLE MODEL ( 50-0, 41-T ) IN THE LANGLEY RESEARCH CENTER NITROGEN TUNNEL AT MACH 19
2158	147,640	IS6A	FLOW VISUALIZATION TESTS OF A 0.004-SCALE SPACE SHUTTLE VEHICLE 2A MODEL (NO. 13-0TS) IN THE MSFC 14-INCH TRISONIC WIND TUNNEL
2159	134,410 V-01	OA59	AERODYNAMIC RESULTS OF SUPPORT SYSTEM EFFECTS TESTS CONDUCTED IN NASA/ARC 6-BY 6-FOOT SUPERSONIC WIND TUNNEL USING A 0.015-SCALE MODEL OF THE CONFIGURATION 140A/B SSV ORBITER (OA59)
2159	134,412 V-02	OA59	AERODYNAMIC RESULTS OF SUPPORT SYSTEM EFFECTS TESTS CONDUCTED IN NASA/ARC 6-BY-6 FOOT SUPERSONIC WIND TUNNEL USING A 0.015 -SCALE MODEL OF THE CONFIGURATION 140A/B SSV ORBITER (OA59)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2160	134,413	IA18	WIND TUNNEL TESTS OF THE 0.010-SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES 3.5 FOOT HYPERSONIC WIND TUNNEL (IA18)
2161	134,422	SA6F	AERODYNAMIC CHARACTERISTICS OF MSFC MODEL 454 OF THE 142 INCH SOLID ROCKET BOOSTER TESTED IN THE LERC 10-FOOT SWT AT MACH NUMBERS OF 2.0 AND 2.7 (SA6F)
2162	134,430	OA36	RESULTS OF INVESTIGATIONS ON AN 0.015-SCALE 140A/B CONFIGURATION OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE NASA/AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (OA36)
2163	134,403	OA20B	AERODYNAMIC RESULTS OF A SUPPORT SYSTEM INTERFERENCE EFFECTS TEST CONDUCTED AT NASA/LARC UPWT USING AN 0.015-SCALE MODEL OF THE CONFIGURATION 140A/B SSV ORBITER (OA20B)
2164	141,828 V-01	OH12/1H21	HEAT TRANSFER TESTS ON A 0.01-SCALE ROCKWELL CONFIGURATION 3 SPACE SHUTTLE ORBITER AND TANK (37-0T) IN THE CALSPAN 48-INCH HYPERSONIC SHOCK-TUNNEL (OH12/1H21)
2164	141,829 V-02	OH12/1H21	HEAT TRANSFER TESTS ON A 0.01-SCALE ROCKWELL CONFIGURATION 3 SPACE SHUTTLE ORBITER AND TANK (37-0T) IN THE CALSPAN 48-INCH HYPERSONIC SHOCK TUNNEL (OH12/1H21)
2164	141,830 V-03	OH12/1H21	HEAT TRANSFER TESTS ON A 0.01-SCALE ROCKWELL CONFIGURATION 3 SPACE SHUTTLE ORBITER AND TANK (37-0T) IN THE CALSPAN 48-INCH HYPERSONIC SHOCK TUNNEL (OH12/1H21)
2165	141,823 V-01	TA2F	RESULTS OF AN INVESTIGATION OF AN 0.003-SCALE SPACE SHUTTLE EXTERNAL TANK (MSFC MODEL 460) IN THE NASA/MSFC 14 X 14-INCH TRISONIC WIND TUNNEL TO DETERMINE STATIC PRESSURE DISTRIBUTIONS DURING REENTRV (TA2F)
2165	141,824 V-02	TA2F	RESULTS OF AN INVESTIGATION OF AN 0.003-SCALE SPACE SHUTTLE EXTERNAL TANK (MSFC MODEL 460) IN THE NASA/MSFC 14 X 14-INCH TRISONIC WIND TUNNEL TO DETERMINE STATIC PRESSURE DISTRIBUTIONS DURING REENTRY (TA2F)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2165	141,825 V-03	TA2F	RESULTS OF AN INVESTIGATION OF AN 0.003-SCALE SPACE SHUTTLE EXTERNAL TANK (MSFC MODEL 460) IN THE NASA/MSFC 14 X 14-INCH TRISONIC WIND TUNNEL TO DETERMINE STATIC PRESSURE DISTRIBUTIONS DURING REENTRY (TA2F)
2165	141,826 V-04	TA2F	RESULTS OF AN INVESTIGATION OF AN 0.003-SCALE SPACE SHUTTLE EXTERNAL TANK (MSFC MODEL 460) IN THE NASA/MSFC 14 X 14-INCH TRISONIC WIND TUNNEL TO DETERMINE STATIC PRESSURE DISTRIBUTIONS DURING REENTRY (TA2F)
2165	141,827 V-05	TA2F	RESULTS OF AN INVESTIGATION OF AN 0.003-SCALE SPACE SHUTTLE EXTERNAL TANK (MSFC MODEL 460) IN THE NASA/MSFC 14 X 14-INCH TRISONIC WIND TUNNEL TO DETERMINE STATIC PRESSURE DISTRIBUTIONS DURING REENTRY (TA2F)
2166	141,534	IH16	HEAT TRANSFER TESTS OF AN 0.006 SCALE THIN-SKIN SPACE SHUTTLE THERMOCOUPLE MODEL (41-OTS) IN THE LANGLEY RESEARCH CENTER UNITARY PLAN WIND TUNNEL AT M=3.7 (IH16)
2167	141,550	OA98	RESULTS OF AN INVESTIGATION ON AN 0.015-SCALE MODEL(49-0) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE NASA AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (OA98)
2168	TM-X71945	LA32	HEAT TRANSFER TO SURFACE AND GAPS OF RSI TILE ARRAYS IN TURBULENT FLOW AT MACH 10.3
2169	141,836 V-01	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 1 OF 7
2169	141,837 V-02	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 2 OF 7



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2169	141,838 V-03	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 3 OF 7
2169	141,839 V-04	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 4 OF 7
2169	141,840 V-05	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 5 OF 7
2169	141,841 V-06	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 6 OF 7
2169	141,842 V-07	IA81A	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-OTS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 11 X 11 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81A) VOLUME 7 OF 7
2170	141,543 V-01	IA19	RESULTS OF A JET PLUME EFFECTS TEST ON THE ROCKWELL INTERNATIONAL INTEGRATED SPACE SHUTTLE VEHICLE USING A VEHICLE 5 CONFIGURATION 0.02-SCALE MODEL (88-OTS) IN THE 11 X 11 FOOT LEG OF THE NASA/AMES RESEARCH CENTER UNITARY PLAN WIND TUNNEL (IA19)
2170	141,544 V-02	IA19	RESULTS OF A JET PLUME EFFECTS TEST ON THE ROCKWELL INTERNATIONAL INTEGRATED SPACE SHUTTLE VEHICLE USING A VEHICLE 5 CONFIGURATION 0.02-SCALE MODEL (88-OTS) IN THE 11 X 11 FOOT LEG OF THE NASA/AMES RESEARCH CENTER UNITARY PLAN WIND TUNNEL (IA19)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2170	141,545 V-03	IA19	RESULTS OF A JET PLUME EFFECTS TEST ON THE ROCKWELL INTERNATIONAL INTEGRATED SPACE SHUTTLE VEHICLE USING A VEHICLE 5 CDNFIGURATION 0.02-SCALE MODEL (88'OTS) IN THE 11 X 11 FOOT LEG OF THE NASA/AMES RESEARCH CENTER UNITARY PLAN WIND TUNNEL (IA19)
2171	144,584 V-01	OH38	RESULTS OF PRESSURE DISTRIBUTION TESTS OF A 0.010-SCALE SPACE SHUTTLE ORBITER MODEL (61-0) IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL ( OH38 )
2171	144,585 V-02	OH38	RESULTS OF PRESSURE DISTRIBUTION TESTS OF A 0.010-SCALE SPACE SHUTTLE ORBITER MODEL (61-0) IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL ( OH38 )
2171	144,586 V-03	OH38	RESULTS OF PRESSURE DISTRIBUTION TESTS OF A 0.010-SCALE SPACE SHUTTLE ORBITER MODEL (61-0) IN THE NASA/ARC 3 5-FOOT HYPERSONIC WIND TUNNEL ( OH38 )
2172	134,415	OA99	RESULTS OF REACTION CONTROL SYSTEM ON-ORBIT JET USING AN 0.0175-SCALE CONFIGURATION 3 SPACE SHUTTLE ORBITER MODEL (21-0) IN THE LARC 60-FOOT VACUUM SPHERE
2173	134,107	IA8	AERODYNAMIC RESULTS OF AN ABORT SEPARATION EFFECTS TEST (IA8) CONDUCTED IN THE NASA/LARC 14-FOOT TRANSONIC WIND TUNNEL ON A MODEL (6-0TS) OF THE ROCKWELL INTERNATIONAL LAUNCH CONFIGURATION INTEGRATED VEHICLE
2174	141,811 V-01	IA33	AN INVESTIGATION IN THE MSFC 14-INCH TWT TO DETERMINE THE STATIC STABILITY CHARACTERISTICS OF THE 0.004-SCALE MODEL (74-0TS) SPACE SHUTTLE VEHICLE 5 CONFIGURATION (IA33)
2174	141,812 V-02	IA33	AN INVESTIGATION IN THE MSFC 14-INCH TWT TO DETERMINE THE STATIC STABILITY CHARACTERISTICS OF THE 0.004-SCALE MODEL (74-0TS) SPACE SHUTTLE VEHICLE 5 CONFIGURATION (IA33)
2174	141,813 V-03	IA33	AN INVESTIGATION IN THE MSFC 14-INCH TWT TO DETERMINE THE STATIC STABILITY CHARACTERISTICS OF THE 0.004-SCALE MODEL (74-0TS) SPACE SHUTTLE VEHICLE 5 CONFIGURATION (IA33)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2175	134,431 V-01	IA70	SUBSONIC AND TRANSONIC HINGE MOMENT AND WING BENDING/TORSION CHARACTERISTICS FOR THE -140A/B INTEGRATED SPACE SHUTTLE VEHICLE (IA70) VOLUME 1 OF 3
2175	134,432 V-02	IA70	SUBSONIC AND TRANSONIC HINGE MOMENT AND WING BENDING/TORSION CHARACTERISTICS FOR THE -140A/B INTEGRATED SPACE SHUTTLE VEHICLE (IA70) VOLUME 2 OF 3
2175	134,433 V-03	IA70	SUBSONIC AND TRANSONIC HINGE MOMENT AND WING BENDING/TORSION CHARACTERISTICS FOR THE -140A/B INTEGRATED SPACE SHUTTLE VEHICLE (IA70) VOLUME 3 OF 3
2176	TM-X72661 VOL. IV	LA40	SPACE SHUTTLE ORBITER TRIMMED CENTER OF GRAVITY EXTENSION STUDY VOLUME IV - EFFECTS OF CONFIGURATION MOOIFICATIONS ON THE AERODYNAMICS OF THE 139B ORBITER AT MACH 20.3
2177	141,510	OA83	RESULTS OF INVESTIGATIONS ON AN 0.015-SCALE CONFIGURATION 140A/B SPACE SHUTTLE VEHICLE ORBITER REACTION CONTROL SYSTEM PLUME-IMPINGEMENT MODEL 36-0 IN THE NASA/AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (OA83)
2178	134,119	OA53B	INVESTIGATIONS ON AN 0.030-SCALE SPACE SHUTTLE VEHICLE CONFIGURATION 140A/B ORBITER MODEL IN THE AMES RESEARCH CENTER 9- BY 7-FOOT SUPERSONIC WIND TUNNEL (OA53B)
2179	151,378	OS8A/B	RESULTS OF AN INVESTIGATION OF THE ACOUSTIC AND VIBRATIONAL ENVIRONMENT OF A FULL SCALE SPACE SHUTTLE ORBITER STRUCTURAL TEST PANEL WITH SIMULATED TPS IN THE AMES UNITARY PLAN WIND TUNNEL (MODEL 81-0, TEST OS8A AND B)
2180	147,615 V-01	IH28	HEAT TRANSFER TEST OF AN 0.006-SCALE THIN-SKIN THERMOCOUPLE SPACE SHUTTLE MODEL (50-0, 41T) IN THE NASA-AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL AT MACH 5.3 (IH-28)
2180	147,616 V-02	IH28	HEAT TRANSFER TEST OF AN 0.006-SCALE THIN-SKIN THERMOCOUPLE SPACE SHUTTLE MODEL (50-0, 41T) IN THE NASA-AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL AT MACH 5.3 (IH-28)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2181	134,425	TA9F	A HYPERSONIC FORCE AND MOMENT TEST OF A 0.006 SCALE MODEL OF THE 330.2 INCH DIAMETER EXTERNAL TANK IN THE AMES RESEARCH CENTER 3.5 FT. HYPERSONIC WIND TUNNEL (TA9F)
2182	151,062	LA49	SUPERSONIC CONTROL EFFECTIVENESS FOR FULL AND PARTIAL SPAN ELEVON CONFIGURATIONS ON A 0.0165 SCALE MODEL SPACE SHUTTLE ORBITER TESTED IN THE LARC UNITARY PLAN WIND TUNNEL
2183	TM-X72661 VOL. II	LA51	SPACE SHUTTLE ORBITER TRIMMED CENTER-OF-GRAVITY EXTENSION STUDY: VOLUME II-EFFECTS OF CONFIGURATION MODIFICATIONS ON THE AERODYNAMIC CHARACTERISTICS OF THE 140A/B ORBITER AT TRANSONIC SPEEDS
2184	151,061	LA48	TRANSONIC CONTROL EFFECTIVENESS FOR FULL AND PARTIAL SPAN ELEVON CONFIGURATIONS ON A 0.0165 SCALE MODEL SPACE SHUTTLE ORBITER TESTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL
2185	134,120	OA53C	INVESTIGATIONS ON AN 0.030-SCALE SPACE SHUTTLE VEHICLE CONFIGURATION 140A/B ORBITER MODEL IN THE AMES RESEARCH CENTER UNITARY PLAN 8-BY 7-FOOT SUPERSONIC WIND TUNNEL
2186	134,428	OA116	RESULTS OF DIFFERENTIAL ELEVON/AILERON DEFLECTION FOR LATERAL CONTROL OPTIMIZATION AND ELEVON HINGE MOMENT INVESTIGATIONS ON AN 0.015-SCALE MODEL(49-0) OF THE SPACE SHUTTLE ORBITER IN THE NASA/LANGLEY RESEARCH CENTER 8-FOOT TRANSONIC PRESSURE TUNNEL
2187	134,421	OA119A	EFFECTS OF WING/ELEVON GAP SEALING FLAPPER DOORS ON ORBITER ELEVON EFFECTIVENESS (OA119A)
2188	UNPUB	LA39	** DOCUMENT WAS NOT PUBLISHED **
2189	141,506	IA110	RESULTS OF INVESTIGATION IA110 ON A 0.015-SCALE INTEGRATED CONFIGURATION OF THE SPACE SHUTTLE VEHICLE IN THE ARC 9X7 SUPERSONIC WIND TUNNEL USING MODELS 67-TS AND 49-0

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2190	141,537	OA108	INVESTIGATION IN THE MSFC TWT TO VERIFY THE STATIC STABILITY AND CONTROL EFFECTIVENESS OF THE 0.004-SCALE MODEL (74-0) OF THE SHUTTLE 5 ORBITER (OA-108)
2191	TM-X72661 VOL. I	LA47	SPACE SHUTTLE ORBITER TRIMMED CENTER OF GRAVITY EXTENSION STUDY VOLUME I--EFFECTS OF CONFIGURATIONS ON THE AERODYNAMIC CHARACTERISTICS OF THE 140 A/B ORBITER AT MACH 10.3
2192	141,541 V-01	IA87	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST (IA87) ON A 0.01-SCALE MODEL (52-0TS) OF THE INTEGRATED SSV IN THE AEDC/VKF 40-BY-40 INCH SUPERSONIC WIND TUNNEL A
2192	141,542 V-02	IA87	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST (IA87) ON A 0.01-SCALE MODEL (52-0TS) OF THE INTEGRATED SSV IN THE AEDC/VKF 40-BY-40 INCH SUPERSONIC WIND TUNNEL A
2193	151,380	OH26	RESULTS OF HEAT TRANSFER TEST OF A 0.0175-SCALE SPACE SHUTTLE ORBITER 140B MODEL (MODIFIED 22-0) IN THE NASA-AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL
2194	141,817 V-01	IA81B	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-0TS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 9 X 7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81B) VOLUME 1 OF 5
2194	141,818 V-02	IA81B	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-0TS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 9 X 7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81B) VOLUME 2 OF 5
2194	141,819 V-03	IA81B	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-0TS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 9 X 7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81B) VOLUME 3 OF 5

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2194	141,820 V-04	IA81B	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-0TS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 9 X 7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81B) VOLUME 4 OF 5
2194	141,821 V-05	IA81B	RESULTS OF A PRESSURE LOADS INVESTIGATION ON A 0.030-SCALE MODEL (47-0TS) OF THE INTEGRATED SPACE SHUTTLE VEHICLE CONFIGURATION 5 IN THE NASA AMES RESEARCH CENTER 9 X 7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL (IA81B) VOLUME 5 OF 5
2195	134,442	OA82	RESULTS OF TEST OA82 IN THE NASA/LRC 31-INCH CFHT ON AN 0.010-SCALE MODEL(32-0) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE RCS JET FLOW FIELD INTERACTION AND TO INVESTIGATE RT REAL GAS EFFECTS
2196	141,531	OA79	RESULTS OF INVESTIGATIONS OF AN 0.015 SCALE SPACE SHUTTLE VEHICLE 140A/B CONFIGURATION WITH MODIFIED OMS PODS AND ELEVONS IN THE AEDC VKF TUNNEL B (OA79)
2197	134,418	FH10	PRESSURE AND HEAT-FLUX RESULTS FROM THE SPACE SHUTTLE/EXTERNAL FUEL TANK INTERACTION TEST AT MACH NUMBERS 16 AND 19 (FH10)
2198	141,534	OA115	DIFFERENTIAL ELEVON EFFECTIVENESS LATERAL CONTROL OPTIMIZATION AND ELEVON HINGE MOMENT INVESTIGATION ON A 0.015-SCALE SPACE SHUTTLE ORBITER MODEL (140 A/B/C MODIFIED) IN THE AEDC VKF WIND TUNNEL A (OA115)
2199	TM-X3315	LA43A/B	SUPERSONIC DYNAMIC-STABILITY DERIVATIVES OF THE SPACE SHUTTLE LAUNCH VEHICLE
2200	TM-X3336	LA44	SUBSONIC AND TRANSONIC DYNAMIC-STABILITY CHARACTERISTICS OF THE SPACE SHUTTLE LAUNCH VEHICLE
2201	160,854	CA3	MATED CARRIER AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR 0.04-SCALE MODEL BOEING 747 CARRIER (MODEL TE 1065)/SS ORBITER (MODEL 43-0) AND 747 CARRIER/ET (MODEL 1284-72) COMBINATIONS IN THE U. OF WASH. AERONAUTICAL LABORATORY (UWAL) F.K.KIRSTEN WIND TUNNEL (CA3)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2202	141,526	OA123	SPACE SHUTTLE VEHICLE FERRY CONFIGURATION AFTERBODY FAIRING EFFECTS ON 140A/B ORBITER AERODYNAMIC CHARACTERISTICS USING AN .0405-SCALE MODEL ORBITER (43-0) IN THE ROCKWELL INTERNATIONAL 7.75 X 11 FT LOW SPEED WIND TUNNEL (OA123)
2203	141,524	OA119B	RESULTS OF AN INVESTIGATION OF ELEVON HINGE MOMENTS AND DUAL PANEL ELEVON EFFECTIVENESS USING AN .0405-SCALE MODEL (16-0) OF THE CONFIGURATION 140C SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL LOW SPEED WIND TUNNEL (OA119B)
2204	141,525	IA43	RESULTS OF TRANSONIC WIND TUNNEL TESTS ON AN 0.010- SCALE SPACE SHUTTLE MATED VEHICLE MODEL 72-0TS IN THE LARC 8-FOOT TPT (IA43)
2205	141,532	OA109	RESULTS OF A 0.004-SCALE 140C MODIFIED CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL (74-0) IN THE NASA/LANGLEY RESEARCH CENTER HYPERSONIC HELIUM TUNNEL (OA109)
2206	141,528	IA44	RESULTS OF INVESTIGATIONS ON AN 0.010-SCALE 140A/B CONFIGURATION (MODEL 720TS) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE NASA/LANGLEY RESEARCH CENTER UNITARY PLAN WIND TUNNEL (IA44)
2207	147,608	SA29F	AN INVESTIGATION TO DETERMINE THE PRESSURE DISTRIBUTION ON THE 0.0137 SCALE SOLID ROCKET BOOSTER FOREBODY (MSFC MODEL 467) AT HIGH ANGLES OF ATTACK AT OR NEAR 90 DEGREES AND HIGH REYNOLDS NUMBERS IN THE MSFC HIGH REYNOLDS NUMBER WIND TUNNEL
2208	144,590 V-01	TA3F	AN INVESTIGATION OF THE 0.0091 SCALE EXTERNAL TANK OGIVE NOSE (MSFC MODEL 470) IN THE MSFC 14 INCH TWT TO DETERMINE THE PRESSURE DISTRIBUTION AROUND THE EXTERNAL TANK NOSE
2208	144,591 V-02	TA3F	AN INVESTIGATION OF THE 0.0091 SCALE EXTERNAL TANK OGIVE NOSE (MSFC MODEL 470) IN THE MSFC 14 INCH TWT TO DETERMINE THE PRESSURE DISTRIBUTION AROUND THE EXTERNAL TANK NOSE

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2209	141,536	OA124	RESULTS OF A SPACE SHUTTLE VEHICLE FERRY CONFIGURATION AFTERBODY FAIRING OPTIMIZATION STUDY USING A 140A/B 0.0405-SCALE MODEL ORBITER (43-0) IN THE ROCKWELL INTERNATIONAL 7.75 X 11.0 FT LOW SPEED WIND TUNNEL (OA124)
2210	151,372	IH27	CONNECTIVE HEAT-TRANSFER TEST RESULTS FOR A GAP, CYLINDRICAL-PROTUBERANCE, AND SHOCK-IMPINGEMENT FLAT-PLATE MODEL IN THE NASA-AMES 3.5-FOOT HYPERSONIC WIND TUNNEL (TEST IH27, MODEL 15-0 VIII)
2211	141,800 V-01	CA5	RESULTS OF A 0.03-SCALE AERODYNAMIC CHARACTERISTICS INVESTIGATION OF A BOEING 747 CARRIER(MODEL ND. AX 1319 1-1) MATED WITH A SPACE SHUTTLE ORBITER (MODEL 45-0) CONDUCTED IN THE BOEING TRANSONIC WIND TUNNEL (CA5)
2211	141,803 V-02	CA5	RESULTS OF A 0.03-SCALE AERODYNAMIC CHARACTERISTICS INVESTIGATION OF LE ORBITER (MODEL 45-0) CONDUCTED IN THE BOEING TRANSONIC WIND TUNNEL (CA5)
2211	141,804 V-03	CA5	RESULTS OF A 0.03-SCALE AERODYNAMIC CHARACTERISTICS INVESTIGATION OF A BOEING 747 CARRIER(MODEL NO. AX-1319 1-1) MATED WITH A SPACE SHUTTLE ORBITER (MODEL 45-0) CONDUCTED IN THE BOEING TRANSONIC WIND TUNNEL (CA5)
2212	147,632 V-01	IA80	INVESTIGATIONS OF THE 0.020-SCALE 88-OTS INTEGRATED SPACE SHUTTLE VEHICLE JET-PLUME MODEL IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT UNITARY PLAN WIND TUNNEL (IA80)
2212	147,633 V-02	IA80	INVESTIGATIONS OF THE 0.020-SCALE 88-OTS INTEGRATED SPACE SHUTTLE VEHICLE JET-PLUME MODEL IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT UNITARY PLAN WIND TUNNEL (IA80)
2212	147,634 V-03	IA80	INVESTIGATIONS OF THE 0.020-SCALE 88-OTS INTEGRATED SPACE SHUTTLE VEHICLE JET-PLUME MODEL IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT UNITARY PLAN WIND TUNNEL (IA80)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2212	147,635 V-04	IA80	INVESTIGATIONS OF THE 0.020-SCALE 88-0TS INTEGRATED SPACE SHUTTLE VEHICLE JET-PLUME MODEL IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT UNITARY PLAN WIND TUNNEL (IA80)
2213	UNPUB	LA53/LA54	** DOCUMENT WAS NOT PUBLISHED **
2214	141,513	OA89	RESULTS OF INVESTIGATIONS ON AN 0.004-SCALE 140C MODIFIED CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL (74-0) IN THE NASA/LANGLEY RESEARCH CENTER HYPERSONIC NITROGEN TUNNEL (OA89)
2215	144,592	LA58	UPPER WING SURFACE BOUNDARY LAYER MEASUREMENTS AND STATIC AERODYNAMIC DATA OBTAINED ON AN 0.015-SCALE MODEL OF THE SSV ORBITER CONFIGURATION 140A/B IN THE LTV HSWT AT A MACH NUMBER OF 4.6 (LA58)
2216	141,802	SH12F	RESULTS OF AEROTHERMODYNAMIC HEATING TEST ON A 0.013 SCALE MODEL SOLID ROCKET BOOSTER IN THE NASA/LARC UNITARY PLAN WIND TUNNEL (SH12F)
2217	141,844 V-01	CA20	AERODYNAMIC RESULTS OF A SEPARATION TEST(CA20) CONDUCTED AT THE BOEING TRANSONIC WIND TUNNEL USING 0.030-SCALE MODELS OF THE CONFIGURATION 140A/B (MODIFIED) SSV ORBITER (MODEL NO. 45-0) AND THE BOEING 747 CARRIER (MODEL NO. AX 1319 I-1)
2217	141,845 V-02	CA20	AERODYNAMIC RESULTS OF A SEPARATION TEST(CA20) CONDUCTED AT THE BOEING TRANSONIC WIND TUNNEL USING 0.030-SCALE MODELS OF THE CONFIGURATION 140A/B (MODIFIED) SSV ORBITER (MODEL NO. 45-0) AND THE BOEING 747 CARRIER (MODEL NO. AX 1319 I-1)
2217	141,846 V-03	CA20	AERODYNAMIC RESULTS OF A SEPARATION TEST(CA20) CONDUCTED AT THE BOEING TRANSONIC WIND TUNNEL USING 0.030-SCALE MODELS OF THE CONFIGURATION 140A/B (MODIFIED) SSV ORBITER (MODEL NO. 45-0) AND THE BOEING 747 CARRIER (MODEL NO. AX 1319 I-1)
2218	151,367	TH1F	PRESSURE AND HEAT TRANSFER TESTS RESULTS ON THE SPACE SHUTTLE 0.015-SCALE EXTERNAL TANK AT MACH 16 IN AEDC TUNNEL F

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2219	144,597 V-01	IA82C	RESULTS OF AN INVESTIGATION OF JET PLUME EFFECTS ON AN 0.010-SCALE MODEL (75-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE 8- BY 7-FOOT LEG OF THE NASA/AMES UNITARY WIND TUNNEL (IA82C)
2219	144,598 V-02	IA82C	RESULTS OF AN INVESTIGATION OF JET PLUME EFFECTS ON AN 0.010-SCALE MODEL (75-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE 8- BY 7-FOOT LEG OF THE NASA/AMES UNITARY WIND TUNNEL (IA82C)
2220	TM-X72661 VOL. VIII	LA52	SPACE SHUTTLE ORBITER TRIMMED CENTER-OF-GRAVITY EXTENSION STUDY: VOLUME VIII - EFFECT OF CONFIGURATION MODIFICATIONS ON THE AERODYNAMIC CHARACTERISTICS OF THE 140 A/B ORBITER AT A MACH NUMBER OF 5.97.
2221	141,548	OA143	INVESTIGATION OF SPACE SHUTTLE VEHICLE 140C CONFIGURATION ORBITER (MODEL 16-0) WHEEL WELL PRESSURE LOADS IN THE ROCKWELL INTERNATIONAL 7.75 X 11 FOOT WIND TUNNEL ( OA143 )
2222	147,626 V-01	OH49B	RESULTS FROM A CONVECTIVE HEAT-TRANSFER-RATE DISTRIBUTION TEST ON A 0.0175 SCALE MODEL(22-0) OF THE ROCKWELL INTERNATIONAL VEHICLE 4 SPACE SHUTTLE CONFIGURATION IN THE AEDC-VKF TUNNEL B (OH49B)
2222	147,627 V-02	OH49B	RESULTS FROM A CONVECTIVE HEAT-TRANSFER-RATE DISTRIBUTION TEST ON A 0.0175 SCALE MODEL(22-0) OF THE ROCKWELL INTERNATIONAL VEHICLE 4 SPACE SHUTTLE CONFIGURATION IN THE AEDC-VKF TUNNEL B (OH49B)
2223	141,549	SA8F	REENTRY STATIC STABILITY CHARACTERISTICS OF A .005479 SCALE MODEL 146-INCH SOLID ROCKET BOOSTER TESTED IN THE NASA/MSFC 14X14 INCH TWT
2224	147,650	LA56	RESULTS OF A DRAG REDUCTION INVESTIGATED ON AN 0.010-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 72-OTS LAUNCH CONFIGURATION TESTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL FOR THE MACH RANGE OF 0.35 TO 1.20 (LA56)
2225	141,505	OH4C	PHASE CHANGE PAINT TESTS TO INVESTIGATE EFFECTS OF TPS TILES ON HEATING RATES OF THE ROCKWELL SPACE SHUTTLE ORBITER (TEST OH4C. MODEL 21-0)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2226	141,507	IA61B	RESULTS OF FLOW VISUALIZATION TESTS OF 0.010-SCALE SPACE SHUTTLE MODELS 32-OTS AND 52-0 IN THE AEDC VKF TUNNEL A (IA61B)
2227	141,806	IA71	RESULTS OF EXPERIMENTAL TESTS IN THE MSFC 14X14 INCH TRISONIC TUNNEL ON A 0.004 SCALE MODEL SPACE SHUTTLE INTEGRATED VEHICLE 5 (MODEL 77-0, 74-TS) TO RELIEVE WING LOADS DURING ASCENT (IA71)
2228	TM-X72661 VOL. IX	LA46A	SPACE SHUTTLE ORBITER TRIMMED CENTER-OF-GRAVITY EXTENSION STUDY VOLUME IX - EFFECTS OF CONFIGURATION MODIFICATIONS ON THE AERODYNAMIC CHARACTERISTICS OF THE 140A/B ORBITER AT MACH NUMBERS OF 2.5, 3.95 AND 4.6
2228	TM-X72661 VOL. V	LA46B	SPACE SHUTTLE ORBITER TRIMMED CENTER-OF-GRAVITY EXTENSION STUDY VOLUME V - EFFECTS OF CONFIGURATION MODIFICATIONS ON THE AERODYNAMIC CHARACTERISTICS OF THE 140A/B ORBITER AT MACH NUMBERS OF 2.5, 3.95 AND 4.6
2229	141,508	OA102	RESULTS OF FLOW-VISUALIZATION INVESTIGATIONS ON A 0.015-SCALE MODIFIED CONFIGURATION 140A/B SPACE SHUTTLE VEHICLE ORBITER (MODEL 36-0) IN THE LANGLEY RESEARCH CENTER
2230	141,509	IA17B	RESULTS OF OIL FLOW VISUALIZATIONS TESTS OF AN 0.010-SCALE MODEL (52-0T) OF THE SPACE SHUTTLE ORBITER-TANK MATED AND ORBITER CONFIGURATIONS IN THE AEDC VKF TUNNEL B (IA17B)
2231	144,601 V-01	IA82B	RESULTS OF AN INVESTIGATION OF JET PLUME EFFECTS ON AN 0.010-SCALE MODEL (75-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE 9- BY 7-FOOT LEG OF THE NASA/AMES UNITARY WIND TUNNEL (IA82C)
2231	144,602 V-02	IA82B	RESULTS OF AN INVESTIGATION OF JET PLUME EFFECTS ON AN 0.010-SCALE MODEL (75-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE 9- BY 7-FOOT LEG OF THE NASA/AMES UNITARY WIND TUNNEL (IA82C)
2232	141,521	OA131	RESULTS OF INVESTIGATIONS ON THE 0.004-SCALE MODEL 74-0 OF THE CONFIGURATION 4 (MODIFIED) SPACE SHUTTLE VEHICLE ORBITER IN THE NASA/MSFC 14-BY-14-INCH TRISONIC WIND TUNNEL (OA131)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2233	151,068	LA59	RESULTS OF A DRAG REDUCTION INVESTIGATION ON AN 0.010-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE 72-0TS LAUNCH CONFIGURATION TESTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL FOR THE MACH RANGE OF 0.30 TO 1.20
2234	141,547	OA113	WIND TUNNEL TEST OA113 OF THE 0.010-SCALE SPACE SHUTTLE ORBITER MODEL 51-0 IN THE CALSPAN HYPERSONIC SHOCK TUNNEL (48-INCH LEG)
2235	141,810	SA30F	REENTRY AERODYNAMIC FORCES AND MOMENTS ON THE ENGINE NOZZLE OF THE 146-INCH SOLID ROCKET BOOSTER MODEL 473 IN MSFC 14 X 14 INCH TRISONIC WIND TUNNEL (SA30F)
2236	141,835	CA11	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR 0.04-SCALE MODEL BOEING 747 CAM/EXTERNAL TANK (MODEL AX1784 E-5) COMBINATION IN THE UNIVERSITY OF WASHINGTON AERONAUTICAL LABORATORY F.K. KIRSTEN WIND TUNNEL (CA11)
2237	UNPUB	OA155	** DOCUMENT WAS NOT PUBLISHED **
2238	141,847	OA93	RESULTS OF WIND TUNNEL RCS INTERACTION TESTS ON A 0.010-SCALE SPACE SHUTTLE ORBITER MODEL (51-0) IN THE CALSPAN CORPORATION 48-INCH HYPERSONIC SHOCK TUNNEL
2239	UNPUB	LA38B	** DOCUMENT WAS NOT PUBLISHED **
2240	151,054	IH41A	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN THE AEDC TUNNEL A DURING TESTS IH41 AND IH41A
2241	160,490 V-01	OH39	AN INVESTIGATION OF ENTRY HEATING ON THE 0.0175 SCALE SPACE SHUTTLE ORBITER (MODEL 60-0) IN THE AEDC VKF TUNNEL B
2241	160,491 V-02	OH39	AN INVESTIGATION OF ENTRY HEATING ON THE 0.0175 SCALE SPACE SHUTTLE ORBITER (MODEL 60-0) IN THE AEDC VKF TUNNEL B

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2241	160,492 V-03	OH39	AN INVESTIGATION OF ENTRY HEATING ON THE 0.0175 SCALE SPACE SHUTTLE ORBITER (MODEL 60-0) IN THE AEDC VKF TUNNEL B
2241	160,493 V-04	OH39	AN INVESTIGATION OF ENTRY HEATING ON THE 0.0175 SCALE SPACE SHUTTLE ORBITER (MODEL 60-0) IN THE AEDC VKF TUNNEL B
2242	141,831 V-01	IA111	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST ON A 0.010-SCALE MODEL (52-OTS) OF THE INTEGRATED SSV IN THE AEDC/VKF 40-BY-40 INCH SUPERSONIC WIND TUNNEL A (IA111)
2242	144,588 V-02	IA111	AERODYNAMIC RESULTS OF A SEPARATION EFFECTS TEST ON A 0.010-SCALE MODEL (52-OTS) OF THE INTEGRATED SSV IN THE AEDC/VKF 40-BY-40 INCH SUPERSONIC WIND TUNNEL A (IA111)
2243	144,583	CA23A	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER VEHICLE CONFIGURATION TO ESTABLISH A FREE-STREAM DATA BASE FOR ALT SEPARATION INVESTIGATIONS UTILIZING A 0.0125-SCALE MODEL (48-/OAX13181-1) IN THE ARC 14-FOOT WIND TUNNEL (CA23A)
2244	151,082	SA28F	AN INVESTIGATION TO DETERMINE THE STATIC PRESSURE DISTRIBUTION OF THE 0.00548 SCALE SPACE SHUTTLE SOLID ROCKET BOOSTER (MSFC MODEL NUMBER 468) DURING REENTRY IN THE NASA/MSFC 14 INCH TRISONIC WIND TUNNEL
2245	147,618 V-01	OA161A/B/C	RESULTS OF AN INVESTIGATION TO DETERMINE LOCAL FLOW CHARACTERISTICS AT THE AIR DATA PROBE LOCATIONS USING AN 0.030-SCALE MODEL (45-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B (MODIFIED) IN THE NASA AMES RESEARCH CENTER UNITARY PLAN WIND TUNNEL
2245	147,619 V 02	OA161A/B/C	RESULTS OF AN INVESTIGATION TO DETERMINE LOCAL FLOW CHARACTERISTICS AT THE AIR DATA PROBE LOCATIONS USING AN 0.030-SCALE MODEL (45-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B (MODIFIED) IN THE NASA AMES RESEARCH CENTER UNITARY PLAN WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2246	144,600	LA65	LOW SUBSONIC AERODYNAMIC CHARACTERISTICS OF FIVE IRREGULAR PLANFORM WINGS WITH SYSTEMATICALLY VARYING WING FILLET GEOMETRY TESTED IN THE NASA/AMES 12-FOOT PRESSURE TUNNEL (LA65)
2247	141,834	OA160	RESULTS OF AN INVESTIGATION OF HYPERSONIC VISCOUS INTERACTION EFFECTS OF THE SPACE SHUTTLE ORBITER USING A 0.01/ SCALE MODEL (51-01) IN THE AEDC VKF TUNNEL F
2248	144,599	IH48	RESULTS OF HEAT TRANSFER TESTS OF A 0.0175-SCALE SPACE SHUTTLE VEHICLE 5 MODEL (60-OTS) IN THE NASA-AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (TEST IH48)
2249	151,775	IH33	RESULTS OF SPACE SHUTTLE HEAT TRANSFER TESTS USING A 0.01-SCALE MODEL (37-0T) IN THE CALSPAN HYPERSONIC SHOCK TUNNEL (TEST IH33)
2250	141,539	OH43	RESULTS OF CONVECTIVE HEATING TESTS OF A LONGITUDINAL GAP ON THE ROCKWELL FLAT PLATE MODEL (15-0. INSERT VII) IN THE NASA/AMES 3.5 FOOT HYPERSONIC WIND TUNNEL (TEST OH43)
2251	141,540	OH9	RESULTS OF TESTS ON A ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER (-139 CONFIGURATION) 0.0175-SCALE MODEL (NO.29-0) IN AEDC TUNNEL B TO DETERMINE BOUNDARY LAYER CHARACTERISTICS
2252	141,546	OH25A	HEAT TRANSFER PHASE CHANGE PAINT TESTS OF 0.0175-SCALE MODELS (NOS. 21-0 AND 46-0) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE AEDC TUNNEL B HYPERSONIC WIND TUNNEL (TEST OH25A)
2253	144,833	IA125	AN INVESTIGATION IN THE MSFC TNT TO DETERMINE SPOILER EFFECTS ON WING LOADS AND ELEVON HINGE MOMENTS UTILIZING 0.004-SCALE MODELS (77-0 AND 74-0TS) OF THE SHUTTLE VEHICLE 5 CONFIGURATION
2254	144,619 V-O1	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2254	144,620 V-02	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,621 V-03	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,622 V-04	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,623 V-05	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,624 V-06	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 x 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,625 V-07	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,626 V-08	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2254	144,627 V-09	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	144,628 V-10	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	147,601 V-11	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	147,602 V-12	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/B/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2254	147,603 V-13	OA148/OA148P	TERMINAL AREA ENERGY MANAGEMENT REGIME INVESTIGATIONS UTILIZING AN 0.030-SCALE MODEL (47-0) OF THE SPACE SHUTTLE VEHICLE ORBITER CONFIGURATION 140A/8/C/R IN THE AMES RESEARCH CENTER 11 X 11 FOOT TRANSONIC WIND TUNNEL (OA148)
2255	T-X62,444		SHADOWGRAPHS OF AIR FLOW OVER PROSPECTIVE SPACE SHUTTLE CONFIGURATIONS AT MACH NUMBERS FROM 0.8 TO 1.4
2256	UNPUB	LA68	** DOCUMENT WAS NOT PUBLISHED **
2257	151,369	LA69	RESULTS OF A DRAG REDUCTION INVESTIGATION ON AN 0.010-SCALE MODEL OF THE SPACE SHUTTLE VEHICLE (72-0TS) LAUNCH CONFIGURATION TESTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL FOR THE MACH RANGE OF 0.35 TO 1.20
2258	151,045 V-01	1A72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2258	151,046 V-02	IA72	INVESTIGATIONS ON A 0.020-SCALE BET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,047 V-03	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,048 V-04	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,049 V-05	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,050 V-06	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,051 V-07	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,052 V-08	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2258	151,053 V-09	IA72	INVESTIGATIONS ON A 0.020-SCALE JET PLUME MODEL (88-0TS) OF THE ROCKWELL INTERNATIONAL INTEGRATED SSV CONFIGURATION 140C (MODIFIED) IN THE 11-FOOT TRANSONIC WIND TUNNEL
2259	TASK CANCELLED	LA60A	** DOCUMENT WAS NOT PUBLISHED **
2260	UNPUB	LA60B/C	** DOCUMENT WAS NOT PUBLISHED **

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2261	167,364 V-01	OA100	RESULTS OF TESTS USING A 0.36-SCALE MODEL(76-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE NASA/AMES RESEARCH CENTER 40 BY 80-FOOT SUBSONIC WIND TUNNEL (OA100)
2261	167,365 V-02	OA100	RESULTS OF TESTS USING A 0.36-SCALE MODEL(76-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE NASA/AMES RESEARCH CENTER 40 BY 80-FOOT SUBSONIC WIND TUNNEL (OA100)
2262	147,630 V-01	CA6	RESULTS OF A CARRIER AIRCRAFT VERIFICATION TEST IN THE BOEING 8 X 12 FOOT TRANSONIC TUNNEL USING A 0.03-SCALE 747 CAM/ORBITER MODEL 45-0
2262	147,631 V-02	CA6	RESULTS OF A CARRIER AIRCRAFT VERIFICATION TEST IN THE BOEING 8 X 12 FOOT TRANSONIC TUNNEL USING A 0.03-SCALE 747 CAM/ORBITER MODEL 45-0
2263	144,596	OH74	RESULTS OF HEAT TRANSFER TESTS ON A 0.0175-SCALE SPACE SHUTTLE ORBITER MODEL (56-0) IN THE AEDC VKF 'B' HYPERSONIC WIND TUNNEL (OH74)
2264	141,843	LA62	TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 49-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 8-FOOT TPT (LA62)
2265	141,832	OA159	RESULTS OF TESTS USING A 0.030-SCALE MODEL (45-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE NASA/ARC 12-FOOT PRESSURE TUNNEL (OA159)
2266	144,607	LA67	TRANSONIC-SUPERSONIC HIGH REYNOLDS NUMBER STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE VSD HIGH SPEED WIND TUNNEL
2267	147,604 V-01	MA22	RESULTS OF TEST MA22 IN THE NASA/LARC 31-INCH CFHT ON AN 0.010-SCALE MODEL (32-0) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE RCS JET FLOW FIELD INTERACTION AND TO INVESTIGATE RT REAL GAS EFFECTS
2267	147,605 V-02	MA22	RESULTS OF TEST MA22 IN THE NASA/LARC 31-INCH CFHT ON AN 0.010-SCALE MODEL (32-0) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE RCS JET FLOW FIELD INTERACTION AND TO INVESTIGATE RT REAL GAS EFFECTS

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2267	147,606 V-03	MA22	RESULTS OF TEST MA22 IN THE NASA/LARC 31-INCH CFHT ON AN 0.010-SCALE MODEL (32-0) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE RCS JET FLOW FIELD INTERACTION AND TO INVESTIGATE RT REAL GAS EFFECTS
2267	147,607 V-04	MA22	RESULTS OF TEST MA22 IN THE NASA/LARC 31-INCH CFHT ON AN 0.010-SCALE MODEL (32-0) OF THE SPACE SHUTTLE CONFIGURATION 3 TO DETERMINE RCS JET FLOW FIELD INTERACTION AND TO INVESTIGATE RT REAL GAS EFFECTS
2268	151,396 V-01	CA9/CA9P	RESULTS OF AN INVESTIGATION OF AERODYNAMIC FORCES, MOMENTS, AND PRESSURES ON 0.03-SCALE MODELS OF THE MATED SPACE SHUTTLE ORBITER AND CARRIER AIRCRAFT (MODEL NUMBERS AX1319P-1 AND 47-0) IN THE BOEING TRANSONIC WIND TUNNEL (CA9)
2268	151,397 V-02	CA9/CA9P	RESULTS OF AN INVESTIGATION OF AERODYNAMIC FORCES, MOMENTS, AND PRESSURES ON 0.03-SCALE MODELS OF THE MATED SPACE SHUTTLE ORBITER AND CARRIER AIRCRAFT (MODEL NUMBERS AX1319P-1 AND 47-0) IN THE BOEING TRANSONIC WIND TUNNEL (CA9)
2268	151,398 V-08	CA9/CA9P	RESULTS OF AN INVESTIGATION OF AERODYNAMIC FORCES, MOMENTS, AND PRESSURES ON 0.03-SCALE MODELS OF THE MATED SPACE SHUTTLE ORBITER AND CARRIER AIRCRAFT (MODEL NUMBERS AX1319P-1 AND 47-0) IN THE BOEING TRANSONIC WIND TUNNEL (CA9)
2268	151,399 V-04	CA9/CA9P	RESULTS OF AN INVESTIGATION OF AERODYNAMIC FORCES, MOMENTS, AND PRESSURES ON 0.03-SCALE MODELS OF THE MATED SPACE SHUTTLE ORBITER AND CARRIER AIRCRAFT (MODEL NUMBERS AX1319P-1 AND 47-0) IN THE BOEING TRANSONIC WIND TUNNEL (CA9)
2268	151,400 V-05	CA9/CA9P	RESULTS OF AN INVESTIGATION OF AERODYNAMIC FORCES, MOMENTS, AND PRESSURES ON 0.03-SCALE MODELS OF THE MATED SPACE SHUTTLE ORBITER AND CARRIER AIRCRAFT (MODEL NUMBERS AX1319P-1 AND 47-0) IN THE BOEING TRANSONIC WIND TUNNEL (CA9)
2269	147,624	LA70	TRANSONIC HIGH REYNOLDS NUMBER STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE REMOTELY CONTROLLED ELEVON MODEL (44-0) OF THE SPACE SHUTTLE ORBITER TESTED IN THE CALSPAN 8-FOOT TWT

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2270	144,579	LA63A	LOW SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE REMOTELY CONTROLLED ELEVON MODEL (49-0) OF THE SPACE SHUTTLE ORBITER (LA63A)
2271	151,044	LA71A/B	SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE MODEL 69-0 OF THE SPACE SHUTTLE ORBITER WITH FOREBODY RSI MODIFICATIONS IN THE NASA/LARC 4-FOOT UPWT (LEGS 1 AND 2)
2272	151,077 V-01	IA114	RESULTS OF AN INVESTIGATION OF EXTERNAL TANK SEPARATION EFFECTS USING AN 0.010-SCALE MODEL (52-OT) SPACE SHUTTLE VEHICLE IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER VON KARMAN FACILITY TUNNEL B
2272	151,078 V-02	IA114	RESULTS OF AN INVESTIGATION OF EXTERNAL TANK SEPARATION EFFECTS USING AN 0.010-SCALE MODEL (52-OT) SPACE SHUTTLE VEHICLE IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER VON KARMAN FACILITY TUNNEL B
2273	144,612 V-01	CA26	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER FLIGHT TEST CONFIGURATION TO DETERMINE SEPARATION CHARACTERISTICS UTILIZING 0.0125-SCALE MODELS (48-0/AX1318I-1) IN THE LTV 4X4-FOOT HIGH SPEED WIND TUNNEL (CA26)
2273	144,613 V-02	CA26	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER FLIGHT TEST CONFIGURATION TO DETERMINE SEPARATION CHARACTERISTICS UTILIZING 0.0125-SCALE MODELS (48-0/AX1318I-1) IN THE LTV 4X4-FOOT HIGH SPEED WIND TUNNEL (CA26)
2273	144,614 V-03	CA26	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER FLIGHT TEST CONFIGURATION TO DETERMINE SEPARATION CHARACTERISTICS UTILIZING 0.0125-SCALE MODELS (48-D/AX1318I-1) IN THE LTV 4X4-FOOT HIGH SPEED WIND TUNNEL (CA26)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2273	144,615 V-04	CA26	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER FLIGHT TEST CONFIGURATION TO DETERMINE SEPARATION CHARACTERISTICS UTILIZING 0.0125-SCALE MODELS (48-0/AX13181-1) IN THE LTV 4X4-FOOT HIGH SPEED WIND TUNNEL (CA26)
2273	144,616 V-05	CA26	RESULTS OF AN AERODYNAMIC INVESTIGATION OF A SPACE SHUTTLE ORBITER/747 CARRIER FLIGHT TEST CONFIGURATION TO DETERMINE SEPARATION CHARACTERISTICS UTILIZING 0.0125-SCALE MODELS (48-0/AX13181-1) IN THE LTV 4X4-FOOT HIGH SPEED WIND TUNNEL (CA26)
2274	144,593	FA14	FA14 AN INVESTIGATION OF DRAG REDUCTION FAIRINGS ON THE SPACE SHUTTLE VEHICLE 5 CONFIGURATION (MODEL 74-0TS) IN THE MSFC 14-INCH TRISONIC WIND TUNNEL
2275	144,603 V-01	CA23B	RESULTS OF AN EXPERIMENTAL INVESTIGATION TO DETERMINE SEPARATION CHARACTERISTICS FOR THE ORBITER/747 USING A 0.0125-SCALE MODEL (48-0 AX13181-1 747) IN THE AMES RESEARCH CENTER 14-FOOT WIND TUNNEL (CA23B)
2275	144,604 V-02	CA23B	RESULTS OF AN EXPERIMENTAL INVESTIGATION TO DETERMINE SEPARATION CHARACTERISTICS FOR THE ORBITER/747 USING A 0.0125-SCALE MODEL (48-0 AX13181-1 747) IN THE AMES RESEARCH CENTER 14-FOOT WIND TUNNEL (CA23B)
2276	151,055	FH13	HEAT TRANSFER AND SURFACE PRESSURE DATA OBTAINED ON A .0429 SCALE MODEL SSV EXTERNAL TANK NOSE SECTION AT MACH NUMBERS FROM 2.5 TO 5.5 (FH13)
2277	144,579	SA13F	FORCE TEST OF A 0.88 PERCENT SCALE 142-INCH DIAMETER SOLID ROCKET BOOSTER (MSFC MODEL NUMBER 461) IN THE NASA/MSFC HIGH REYNOLDS NUMBER WIND TUNNEL
2278	TASK CANCELLED	LA61	** DOCUMENT WAS NOT PUBLISHED **

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2279	144,606	LA63B	HIGH SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 49-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 2)
2280	144,582	LA28	HEAT-FLUX GAGE MEASUREMENTS ON A FLAT PLATE AT A MACH NUMBER OF 4.6 IN THE VSD HIGH SPEED WIND TUNNEL A FEASIBILITY TEST (LA28)
2281	147,621	LA66	SUBSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE NASA/ARC 12-FOOT PRESSURE TUNNEL (LA66)
2282	151,407	IH34	BASE PRESSURE AND HEAT TRANSFER TESTS OF THE 0.0225-SCALE SPACE SHUTTLE PLUME SIMULATION MODEL 19-0TS IN THE NASA-LEWIS 10X10 FOOT SWT
2283	147,649	MA14	A LOW SPEED WIND TUNNEL TEST OF A 0.050 SCALE MODEL OF SHUTTLE ORBITER (MODEL 089B) TO INVESTIGATE THE LONGITUDINAL AND LATERAL DIRECTIONAL EFFECTS OF CANARD AND TAIL CONFIGURATIONAL MODIFICATIONS IN THE LTV LSWT
2284	151,035 V-01	IS2A/B	AERODYNAMIC NOISE OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE MODEL (84-0TS) IN THE NASA-AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS (IS2A/B)
2284	151,036 V-02	IS2A/B	AERODYNAMIC NOISE OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE MODEL (84-0TS) IN THE NASA-AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS (IS2A/B)
2285	144,595	OH50A	RESULTS OF TESTS USING THE PHASE CHANGE PAINT TECHNIQUE ON 0.04 SCALE 50 PERCENT FOREBODY MODELS (82-0) OF THE ROCKWELL SPACE SHUTTLE ORBITER
2286	147,625	OA220	RESULTS OF AN AIR PROBE INVESTIGATION UTILIZING AN 0.10 SCALE ORBITER (MODEL 57-0) FOREBODY IN THE AMES RESEARCH CENTER 14 FOOT WIND TUNNEL (OA220)
2287	167,699	OS13	RESULTS OF A FRSI MATERIAL TEST UNDER SPACE SHUTTLE ASCENT CONDITIONS IN THE AMES RESEARCH CENTER 9 X 7 FOOT SUPERSONIC WIND TUNNEL.

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2288	151,384	OH64	RESULTS OF BASE HEATING INVESTIGATIONS ON A 0.04 SCALE SPACE SHUTTLE ORBITER BASE (MODEL 25-0) IN THE NASA/LARC SPACE POWER FACILITY
2289	147,611 V-01	OA163	RESULTS OF A LANDING LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163)
2289	147,612 V-02	OA163	RESULTS OF A LANDING LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163)
2289	147,613 V-03	OA163	RESULTS OF A LANDING LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163)
2289	147,614 V-04	OA163	RESULTS OF A LANDING LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163)
2290	147,641 V-01	CA8	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR THE 0.04 SCALE 747 CAM AND THE 0.0405 SCALE SPACE SHUTTLE ORBITER IN THE NASA LANGLEY V/STOL TRANSITION RESEARCH WIND TUNNEL
2290	147,642 V-02	CA8	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR THE 0.04 SCALE 747 CAM AND THE 0.0405 SCALE SPACE SHUTTLE ORBITER IN THE NASA LANGLEY V/STOL TRANSITION RESEARCH WIND TUNNEL
2290	147,643 V-03	CA8	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR THE 0.04 SCALE 747 CAM AND THE 0.0405 SCALE SPACE SHUTTLE ORBITER IN THE NASA LANGLEY V/STOL TRANSITION RESEARCH WIND TUNNEL
2291	UNPUB	LA79	** DOCUMENT WAS NOT PUBLISHED **
2292	TM-X72661 VOL. VII	LA36B	SPACE SHUTTLE TRIMMED CENTER-OF-GRAVITY EXTENSION STUDY: VOLUME VII - EFFECTS OF CONFIGURATION MODIFICATIONS ON THE SUBSONIC AERODYNAMIC CHARACTERISTICS OF THE 140A/B ORBITER AT HIGH REYNOLDS NUMBERS
2293	151,381	IA40	RESULTS OF TESTS USING A 0.010-SCALE SSV MODEL 75-OTS IN THE AEDC VKF TUNNEL A

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2294	160,822 V-01	OA172	RESULTS OF TESTS OF A SPACE SHUTTLE ORBITER FERRY CONFIGURATION USING A 140A/B 0.0405-SCALE MODEL (43-0) IN THE ROCKWELL INTERNATIONAL 7.75 X 11 FOOT LOW SPEED WIND TUNNEL (OA172)
2294	160,823 V-02	OA172	RESULTS OF TESTS OF A SPACE SHUTTLE ORBITER FERRY CONFIGURATION USING A 140A/B 0.0405-SCALE MODEL (43-0) IN THE ROCKWELL INTERNATIONAL 7.75 X 11 FOOT LOW SPEED WIND TUNNEL (OA172)
2295	151,069 V-01	IH41B	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN AEDC TUNNEL A DURING TESTS IH41B
2295	151,070 V-02	IH41B	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN AEDC TUNNEL A DURING TESTS IH41B
2295	151,071 V-03	IH41B	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN AEDC TUNNEL A DURING TESTS IH41B
2295	151,072 V-04	IH41B	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN AEDC TUNNEL A DURING TESTS IH41B
2295	151,073 V-05	IH41B	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE INTEGRATED VEHICLE AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-0TS IN AEDC TUNNEL A DURING TESTS IH41B
2296	147,609 V-01	LA81	SHUTTLE MODEL TAILCONE PRESSURE DISTRIBUTION AT LOW SUBSONIC SPEEDS OF A 0.03614-SCALE MODEL IN THE NASA/LARC LOW TURBULENCE PRESSURE TUNNEL (LA81)
2296	147,610 V-02	LA81	SHUTTLE MODEL TAILCONE PRESSURE DISTRIBUTION AT LOW SUBSONIC SPEEDS OF A 0.03614-SCALE MODEL IN THE NASA/LARC LOW TURBULENCE PRESSURE TUNNEL (LA81)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2297	147,628	LA45A/B	HIGH SUPERSONIC AERODYNAMIC CHARACTERISTICS OF FIVE IRREGULAR PLANFORM WINGS WITH SYSTEMATICALLY VARYING WING FILLET GEOMETRY TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 2) (LA45A/B)
2298	151,409	LA73A/LA73B	LOW SPEED STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE MODEL 69-0 OF THE SPACE SHUTTLE ORBITER WITH FOREBODY RSI MODIFICATIONS IN THE NASA/LARC LOW TURBULENCE PRESSURE TUNNEL (LA73A/B)
2299	TM-X3497	LA80	DYNAMIC STABILITY CHARACTERISTICS OF THE COMBINATION SPACE SHUTTLE ORBITER AND FERRY COMBINATION
2300	147,629	LA61B	LOW-SUBSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE REMOTELY CONTROLLED ELEVON MODEL (44-0) OF THE SPACE SHUTTLE ORBITER IN THE LANGLEY RESEARCH CENTER LOW TURBULENCE PRESSURE TUNNEL
2301	144,605	OH54A	RESULTS OF PHASE CHANGE PAINT HEAT TRANSFER TESTS UTILIZING 0.040 SCALE 50 PERCENT FOREBODY MODELS (NO. 82-0) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN AEDC VKF HYPERSONIC TUNNEL B
2302	167,340 V-01	OA174	RESULTS OF TESTS USING A 0.36-SCALE MODEL(76-0) OF THE SPACE SHUTTLE ORBITER VEHICLE 101 IN THE NASA/AMES RESEARCH CENTER'S 40 X 80 SUBSONIC WIND TUNNEL (OA174)
2302	167,341 V-02	OA174	RESULTS OF TESTS USING A 0.36-SCALE MODEL(76-0) OF THE SPACE SHUTTLE ORBITER VEHICLE 101 IN THE NASA/AMES RESEARCH CENTER'S 40 X 80 SUBSONIC WIND TUNNEL (OA174)
2303	144,618	OH75	RESULTS OF PHASE CHANGE PAINT TESTS OF 0.040 SCALE 50 PERCENT FOREBODY MODELS (82-0) OF THE SPACE SHUTTLE ORBITER IN THE AEDC VKF 'B' HYPERSONIC WIND TUNNEL
2304	160,846	OA173	RESULTS OF TESTS TO EVALUATE ARC 40X80-FOOT TUNNEL SUPPORT STRUT TARES ON THE SPACE SHUTTLE VEHICLE WITH TAIL CONE USING A 0.03-SCALE MODEL (45-0) IN THE NASA/ARC 12-FOOT PRESSURE WIND TUNNEL (OA173)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2305	151,059 V-01	LA76	HIGH REYNOLDS NUMBER TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE VSD HIGH SPEED TUNNEL(LA76)
2305	151,060 V-02	LA76	HIGH REYNOLDS NUMBER TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE VSD HIGH SPEED TUNNEL(LA76)
2306	167,354 V-01	IA135A/B/C	RESULTS OF TESTS ON THE SPACE SHUTTLE LAUNCH CONFIGURATION USING THE 0.03 SCALE MODEL 47-OTS IN THE NASA/AMES UNITARY PLAN WIND TUNNEL (IA135A/B/C)
2306	167,355 V-02	IA135A/B/C	RESULTS OF TESTS ON THE SPACE SHUTTLE LAUNCH CONFIGURATION USING THE 0.03 SCALE MODEL 47-OTS IN THE NASA/AMES UNITARY PLAN WIND TUNNEL (IA135A/B/C)
2306	167,356 V-03	IA135A/B/C	RESULTS OF TESTS ON THE SPACE SHUTTLE LAUNCH CONFIGURATION USING THE 0.03 SCALE MODEL 47-OTS IN THE NASA/AMES UNITARY PLAN WIND TUNNEL (IA135A/B/C)
2307	160,840 V-01	CA14A	RESULTS OF EXPERIMENTAL AERODYNAMIC INVESTIGATION ON A 0.03 SCALE MODEL BOEING 747 CAM WITH SPACE SHUTTLE ORBITER IN THE BOEING 8 X 12 FOOT TRANSONIC WIND TUNNEL (CA14A)
2307	160,841 V-02	CA14A	RESULTS OF EXPERIMENTAL AERODYNAMIC INVESTIGATION ON A 0.03 SCALE MODEL BOEING 747 CAM WITH SPACE SHUTTLE ORBITER IN THE BOEING 8 X 12 FOOT TRANSONIC WIND TUNNEL (CA14A)
2308	147,636	IH5	AN EXPERIMENTAL DETERMINATION IN THE CALSPAN LUDWIG TUBE OF THE BASE ENVIRONMENT OF THE INTEGRATED SPACE SHUTTLE VEHICLE AT SIMULATED MACH 4.5 FLIGHT CONDITIONS (TEST IH5 OF MODEL 19-OTS)
2309	147,644	LA72	TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE MODEL 69-0 OF THE SPACE SHUTTLE ORBITER WITH FOREBODY RSI MODIFICATION IN THE NASA/LARC 8-FOOT TPT (LA72)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2310	151,083 V-01	SA14FB	REENTRY STATIC STABILITY CHARACTERISTICS OF A 0.00548 SCALE MODEL OF A RIGHT HAND 146-INCH DIAMETER SOLID ROCKET BOOSTER (MSFC MODEL 486) REENTRY CONFIGURATION AS DETERMINED FROM TESTS IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL
2310	151,084 V-02	SA14FB	REENTRY STATIC STABILITY CHARACTERISTICS OF A 0.00548 SCALE MODEL OF A RIGHT HAND 146-INCH DIAMETER SOLID ROCKET BOOSTER (MSFC MODEL 486) REENTRY CONFIGURATION AS DETERMINED FROM TESTS IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL
2311	147,620	LA78/87/88	RESULTS FROM INVESTIGATIONS IN THREE NASA/LARC HYPERSONIC WIND TUNNELS ON A 0.004-SCALE MODEL SPACE SHUTTLE ORBITER (MODEL 13P-O) TO DETERMINE REAL GAS EFFECTS (LA78, LA87, LA88)
2312	151,075 V-01	IH47	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE SOLID ROCKET BOOSTER AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-OTS IN AEDC TUNNEL A DURING TESTS IH47
2312	151,076 V-02	IH47	RESULTS OF AN INVESTIGATION OF THE SPACE SHUTTLE SOLID ROCKET BOOSTER AERODYNAMIC HEATING CHARACTERISTICS OBTAINED USING THE 0.0175-SCALE MODEL 60-OTS IN AEDC TUNNEL A DURING TESTS IH47
2313	151,041 V-01	FH14	RESULTS OF WIND TUNNEL TESTS TO DETERMINE HEAT TRANSFER RATES ON A 0.0275 SCALE SPACE SHUTTLE EXTERNAL TANK WITH A 10 DEG/40 DEG DOUBLE CONE-OGIVE NOSE IN THE NASA/ARC 3.5 HYPERSONIC TUNNEL
2313	151,042 V-02	FH14	RESULTS OF WIND TUNNEL TESTS TO DETERMINE HEAT TRANSFER RATES ON A 0.0275 SCALE SPACE SHUTTLE EXTERNAL TANK WITH A 10 DEG/40 DEG DOUBLE CONE-OGIVE NOSE IN THE NASA/ARC 3.5 HYPERSONIC TUNNEL
2313	151,043 V-03	FH14	RESULTS OF WIND TUNNEL TESTS TO DETERMINE HEAT TRANSFER RATES ON A 0.0275 SCALE SPACE SHUTTLE EXTERNAL TANK WITH A 10 DEG/40 DEG DOUBLE CONE-OGIVE NOSE IN THE NASA/ARC 3.5 HYPERSONIC TUNNEL
2314	151,406	OA176	INVESTIGATION OF SUPPORT SYSTEM EFFECTS ON ORBITER LOW SPEED AERODYNAMIC CHARACTERISTICS USING 0.0405-SCALE MODEL 43-0 IN THE NAAL LOW SPEED WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2315	147,623	IA141	RESULTS OF AN INVESTIGATION OF REYNOLDS NUMBER EFFECTS ON INTEGRATED VEHICLE ELEVON HINGE MOMENTS AND WING PANEL LOADS OBTAINED WITH 0.010-SCALE MODEL 72-OTS IN THE ROCKWELL TRISONIC WIND TUNNEL
2316	147,622	IA137	RESULTS OF TEST IA137 IN THE NASA/ARC 14 FOOT TRANSONIC WIND TUNNEL OF THE 0.07 SCALE EXTERNAL TANK FOREBODY (MODEL 68-T) TO DETERMINE AUXILIARY AERODYNAMIC DATA SYSTEM FEASIBILITY
2317	151,787	OH53A	RESULTS OF TESTS TO DETERMINE REACTION CONTROL SYSTEM (RCS) NOZZLE EFFECTS ON THE ORBITER FOREBODY ASCENT AERODYNAMIC HEATING RATES USING A 0.04-SCALE MODEL (83-0) IN THE AMES RESEARCH CENTER 3.5 FOOT HYPERSONIC WIND TUNNEL (OH53A)
2318	147,646 V-01	LA75	HIGH SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-O SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 2) (LA75)
2318	147,647 V-02	LA75	HIGH SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-O SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 2) (LA75)
2319	151,771	IH43	HEAT TRANSFER AND PRESSURE TESTS ON A 0.01-SCALE SPACE SHUTTLE MODEL (59-OT) IN THE CALSPAN HYPERVELOCITY SHOCK TUNNELS (IH43)
2320	151,390 V-01	OA169	RESULTS OF TESTS USING A 0.0125-SCALE MODEL(70-OT)OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B (OA169)
2320	151,391 V-02	OA169	RESULTS OF TESTS USING A 0.0125-SCALE MODEL(70-OT)OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B (OA169)
2320	151,392 V-03	OA169	RESULTS OF TESTS USING A 0.0125-SCALE MODEL(70-OT)OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B (OA169)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2321	151,410 V-01	OH69	RESULTS OF TEST OH69 OBTAINED IN THE AEDC VKF HYPERSONIC TUNNEL B USING THE INFRARED SCANNING METHOD TO OBTAIN HEAT TRANSFER DATA ON THE 0.040 SCALE MODEL 82-0 OF THE SPACE SHUTTLE FOREBODY
2321	151,411 V-02	OH69	RESULTS OF TEST OH69 OBTAINED IN THE AEDC VKF HYPERSONIC TUNNEL B USING THE INFRARED SCANNING METHOD TO OBTAIN HEAT TRANSFER DATA ON THE 0.040 SCALE MODEL 82-0 OF THE SPACE SHUTTLE FOREBODY
2322	160,847	OA228	RESULTS OF TEST OA228 USING THE SSV VEHICLE 102 0.10 SCALE FOREBODY MODEL NO. 57-0 IN THE NAAL LOW SPEED WIND TUNNEL
2323	151,039	IA94A	RESULTS OF INVESTIGATIONS CONDUCTED IN THE LARC 4-FOOT UNITARY PLAN WIND TUNNEL LEG NO. 1 USING THE 0.010-SCALE 72-0TS MODEL OF THE SPACE SHUTTLE INTEGRATED VEHICLE
2324	151,040	IA94B	RESULTS OF INVESTIGATIONS CONDUCTED IN THE LARC 4-FOOT UNITARY PLAN WIND TUNNEL LEG NO. 2 USING THE 0.010-SCALE 72-0TS MODEL OF THE SPACE SHUTTLE INTEGRATED VEHICLE
2325	147,645	SA14FA	AERODYNAMIC CHARACTERISTICS OF A 0.00563 SCALE 142- INCH DIAMETER SOLID ROCKET BOOSTER (MSFC MODEL 449 AND 480) WITH SIDE MOUNTED STINGS IN THE NASA/MSFC 14 INCH TRISONIC WIND TUNNEL
2326	151,037 V-01	IA93	RESULTS OF INVESTIGATIONS CONDUCTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL USING THE 0.010- SCALE 72-0TS MODEL OF THE SPACE SHUTTLE INTEGRATED VEHICLE
2326	151,038 V-02	IA93	RESULTS OF INVESTIGATIONS CONDUCTED IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL USING THE 0.010- SCALE 72-0TS MODEL OF THE SPACE SHUTTLE INTEGRATED VEHICLE
2327	151,079 V-01	IA22	RESULTS OF TESTS USING 0.0125-SCALE MODEL (70-0T) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B
2327	151,080 V-02	IA22	RESULTS OF TESTS USING 0.0125-SCALE MODEL (70-0T) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2327	151,081 V-03	IA22	RESULTS OF TESTS USING 0.0125-SCALE MODEL (70-0T) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL B
2328	TN D-8233	LA34	EFFECT OF A SURFACE-TO-GAP TEMPERATURE DISCONTINUITY ON THE HEAT TRANSFER TO REUSABLE SURFACE INSULATION TILE GAPS
2329	160,837	OA224	CALIBRATION RESULTS OF THE BASELINE AIR DATA PROBES AT THE LANGLEY 16-FOOT TRANSONIC WIND TUNNEL USING A 0.10 SCALE ORBITER FOREBODY MODEL 102 LINES (OA224)
2330	147,637	OH52	RESULTS OF A FLOW FIELD SURVEY CONDUCTED USING THE 0.0175 SCALE ORBITER MODEL 29-0 IN THE AEDC VKF TUNNEL B DURING TEST OH52
2331	160,838 V-01	SA11F	STATIC STABILITY AND PRESSURE DATA FROM WIND TUNNEL TESTS OF A .028-SCALE (MSFC MODEL 483) SPACE SHUTTLE SRB AT REENTRY ATTITUDES IN THE NASA/ARC UNITARY PLAN WIND TUNNELS (SA11F)
2331	160,839 V-02	SA11F	STATIC STABILITY AND PRESSURE DATA FROM WIND TUNNEL TESTS OF A .028-SCALE (MSFC MODEL 483) SPACE SHUTTLE SRB AT REENTRY ATTITUDES IN THE NASA/ARC UNITARY PLAN WIND TUNNELS (SA11F)
2332	151,373	CA13	RESULTS OF AERODYNAMIC FORCE AND MOMENT TESTS OF 0.03-SCALE MODELS (AX13191-3 AND 45-0) OF THE SPACE SHUTTLE ORBITER AND CARRIER IN THE NASA/ARC 14-FOOT TRANSONIC WIND TUNNEL (CA13)
2333	151,374 V-01	OA175	WIND TUNNEL TEST OA175 OF THE 0.030-SCALE SSV ORBITER MODEL (47-0) IN THE 11 X 11-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (OA175)
2333	151,375 V-02	OA175	WIND TUNNEL TEST OA175 OF THE 0.030-SCALE SSV ORBITER MODEL (47-0) IN THE 11 X 11-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (OA175)
2333	151,376 V-03	OA175	WIND TUNNEL TEST OA175 OF THE 0.030-SCALE SSV ORBITER MODEL (47-0) IN THE 11 X 11-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (OA175)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2334	147,648	SA16F	AN INVESTIGATION OF THE AERODYNAMIC CHARACTERISTICS OF A 0.00548 SCALE MODEL (MODEL NO. 486) OF THE SPACE SHUTTLE 146-INCH DIAMETER SOLID ROCKET BOOSTER AT ANGLES OF ATTACK FROM 113 TO 180 DEGREES IN THE AEDC PWT 4-FOOT TRANSONIC WIND TUNNEL
2335	151,783	IA140A/B	RESULTS OF EXPERIMENTAL INVESTIGATIONS IN THE MSFC TWT TO DETERMINE EFFECTS OF A MULTIPLE STING SUPPORT SYSTEM ON THE MATED VEHICLE AERODYNAMICS UTILIZING A 0.004 SCALE (74-0TS, 77-0) SHUTTLE VEHICLE 5 (IA140 A/B)
2336	167,375	LA145	INVESTIGATION OF THE HIGH ANGLE OF ATTACK AERODYNAMICS OF A SPACE SHUTTLE ORBITER(LARC .0098 SCALE MODEL) IN THE LARC UPWT AT MACH NUMBERS FROM 1.5 TO 4.5 (LA145)
2337	151,786	OA236	A VERIFICATION STUDY OF THREE AMES RESEARCH CENTER PITOT-STATIC PROBES IN THE ROCKWELL INTERNATIONAL NAAL LOW SPEED WIND TUNNEL
2338	147,639	CS3	RESULTS OF THE LOW SPEED AEROELASTIC BUFFET TEST WITH A 0.046-SCALE MODEL (747-AX1322D-3/ORBITER 8-0) OF THE 747 CAM/ORBITER IN THE UNIVERSITY OF WASHINGTON WIND TUNNEL
2339	UNPUB	OS32	** DOCUMENT WAS NOT PUBLISHED **
2340	160,501 V-01	OH98	RESULTS OF TESTS ON A 0.0175-SCALE MODEL (60-0) OF THE SPACE SHUTTLE ORBITER TO DETERMINE RE-ENTRY MODE CONVECTIVE HEAT TRANSFER RATES ON THE UPPER WING SURFACE AND SSME NOZZLES IN THE AEDC VKF 'B' HYPERSONIC WIND TUNNEL (OH98)
2340	160,502 V-02	OH98	RESULTS OF TESTS ON A 0.0175-SCALE MODEL (60-0) OF THE SPACE SHUTTLE ORBITER TO DETERMINE RE-ENTRY MODE CONVECTIVE HEAT TRANSFER RATES ON THE UPPER WING SURFACE AND SSME NOZZLES IN THE AEDC VKF 'B' HYPERSONIC WIND TUNNEL (OH98)
2341	147,638	CS4/5	RESULTS OF TESTS CS4 AND CS5 TO INVESTIGATE DYNAMIC LOADS AND PRESSURES ON 0.03-SCALE MODELS (AX1319-3/4 AND 45-0) OF MATED 747 CAM AND SPACE SHUTTLE ORBITER IN THE BOEING TRANSONIC WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2342	151,074	OH54B	RESULTS OF PHASE CHANGE PAINT HEAT TRANSFER TEST UTILIZING 0.040 SCALE 50 PERCENT FOREBODY MODELS (N0. 82-0) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE AEDC VKF HYPERSONIC TUNNEL B
2343	160,849	LA85	PITOT PRESSURE SURVEYS ON THE LEEWARD SURFACE OF A 0.0045-SCALE MODEL ATP SHUTTLE ORBITER AT 30 DEGREES ANGLE OF ATTACK AND MACH 20 IN THE LARC 22 INCH HELIUM TUNNEL (LA85)
2344	151,788 V-01	LA77	TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE NASA/ARC 11-FOOT TRANSONIC WIND TUNNEL (LA77)
2344	151,789 V-02	LA77	TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 OF THE SPACE SHUTTLE ORBITER TESTED IN THE NASA/ARC 11-FOOT TRANSONIC WIND TUNNEL (LA77)
2345	78195	SA21F	AERODYNAMIC ROLL CHARACTERISTICS OF A 0.00548 SCALE 146-INCH SOLID ROCKET BOOSTER REENTRY CONFIGURATION (MSFC MODEL NUMBER 486) OVER A PORTION OF THE REENTRY FLIGHT REGIME IN THE NASA/MSFC 14-INCH TRANSONIC WIND TUNNEL
2346	151,385 V-01	IA142	RESULTS OF SRB SEPARATION TESTS USING THE 0.010-SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A
2346	151,386 V-02	IA142	RESULTS OF SRB SEPARATION TESTS USING THE 0.010-SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A
2346	151,387 V-03	IA142	RESULTS OF SRB SEPARATION TESTS USING THE 0.010-SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A
2347	160,482 V-01	CA15A	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR 0.04-SCALE MODEL BOEING 747 CAM/ORBITER (MODEL AX1284 E-6) COMBINATION IN THE UNIVERSITY OF WASHINGTON AERONAUTICAL LABORATORY F. K. KIRSTEN WIND TUNNEL (CA15A)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2348	160,483 V-01	CA15B	MATED AERODYNAMIC CHARACTERISTICS INVESTIGATION FOR 0.04-SCALE MODEL BOEING 747 CAM/ORBITER (MODEL AX1284 E-7) COMBINATION IN THE UNIVERSITY OF WASHINGTON AERONAUTICAL LABORATORY F. K. KIRSTEN WIND TUNNEL (CA15B)
2349	151,379	CA17	RESULTS OF TEST CA17 CONDUCTED IN THE UWAL LOW SPEED WIND TUNNEL USING THE MATED 0.04-SCALE 747 MODEL AX1284 AND 0.0405 SPACE SHUTTLE ORBITER MODEL 43-0
2350	151,065	OH46	RESULTS OF PHASE CHANGE PAINT THERMAL MAPPING TEST OH46 USING THE 0.006-SCALE MODEL 90-0 IN THE NASA LARC VARIABLE DENSITY TUNNEL
2351	160,853	OA23B	RESULTS OF TEST OA23B USING THE SSV VEHICLE 102 0.10-SCALE FOREBODY MODEL NO. 99-0 IN THE NAAL LOW SPEED WIND TUNNEL TO INVESTIGATE AIR DATA SYSTEM CHARACTERISTICS
2352	151,383	LA91	A STUDY OF TRANSONIC BETA HYSTERESIS OF AN 0.015 SCALE MODEL 44-0 (SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 8-FOOT TRANSONIC) PRESSURE TUNNEL (LA91)
2353	160,827	LA89	SUBSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.030-SCALE SPACE SHUTTLE ORBITER WITH TAILCONE (MODEL 201) TESTED IN THE NASA/ARC 11-FOOT TRANSONIC WIND TUNNEL (LA89)
2354	151,401 V-01	IA143	RESULTS OF SRB SEPARATION TESTS USING THE 0.010 SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A (IA143)
2354	151,402 V-02	IA143	RESULTS OF SRB SEPARATION TESTS USING THE 0.010 SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A (IA143)
2354	151,403 V-03	IA143	RESULTS OF SRB SEPARATION TESTS USING THE 0.010 SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A (IA143)
2354	151,404 V-04	IA143	RESULTS OF SRB SEPARATION TESTS USING THE 0.010 SCALE SSV MODEL 75-0TS IN THE AEDC VKF TUNNEL A (IA143)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2355	151,066	OH49A	RESULTS OF TEST OH49A OF THE 0.0175-SCALE SPACE SHUTTLE ORBITER MODEL 22-0 CONDUCTED IN THE AEDC VKF TUNNEL B TO DETERMINE AERO HEATING CHARACTERISTICS
2356	151,064	OH60	AERODYNAMIC HEATING RESULTS OBTAINED DURING TEST OH60 CONDUCTED IN THE AEDC VKF TUNNEL B USING THE 0.040-SCALE MODEL 83-0 OF THE SPACE SHUTTLE ORBITER FORWARD FIFTY PERCENT FUSELAGE
2357	167,655	IH68	RESULTS OF ASCENT AERODYNAMIC HEATING TESTS ON THE SPACE SHUTTLE ASCENT VEHICLE, AT MACH 5.3 AND 7.4 IN THE NASA/AMES 3.5-FOOT HWT, USING THE 0.0175-SCALE MODEL 60 OTS (IH68)
2358	151,067	OH50B	AERODYNAMIC HEATING RESULTS OBTAINED DURING TEST OH50B CONDUCTED IN THE AEDC VKF TUNNEL R USING THE 0.040-SCALE 83-0 OF THE SPACE SHUTTLE ORBITER FORWARD FIFTY PERCENT FUSELAGE
2359	151,405	OH66	RESULTS OF HEAT TRANSFER TESTING OF AN 0.025-SCALE MODEL (66 0) OF THE SPACE SHUTTLE ORBITER CONFIGURATION 140B IN THE CALSPAN HYPERSONIC SHOCK TUNNEL (OH66)
2360	160,521 V-01	OA221B/C	CALIBRATION TESTS OF THE SPACE SHUTTLE ORBITER PRIMARY AND ALTERNATE AIR DATA SYSTEMS USING A 0.10-SCALE ORBITER FOREBODY MODEL (99-0) IN THE NASA AMES RESEARCH CENTER 9 X 7 AND 8 X 7-FOOT LEGS OF THE UNITARY PLAN WIND TUNNEL (OA221B AND C )
2360	160,522 V-02	OA221B/C	CALIBRATION TESTS OF THE SPACE SHUTTLE ORBITER PRIMARY AND ALTERNATE AIR DATA SYSTEMS USING A 0.10-SCALE ORBITER FOREBODY MODEL (99-0) IN THE NASA AMES RESEARCH CENTER 9 X 7 AND 8 X 7-FOOT LEGS OF THE UNITARY PLAN WIND TUNNEL (OA221B AND C )
2361	151,370 V-01	OA163B	RESULTS OF A LANDING GEAR LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163B)
2361	151,371 V-02	OA163B	RESULTS OF A LANDING GEAR LOADS TEST USING A 0.0405-SCALE MODEL (16-0) OF THE SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL WIND TUNNEL (OA163B)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2362	UNPUB	LA92	** DOCUMENT WAS NOT PUBLISHED **
2363	151,057	OS7	RESULTS OF FLUTTER TEST OS7 OBTAINED USING THE 0.14- SCALE SPACE SHUTTLE ORBITER FIN/RUDDER MODEL NUMBER 55-0 IN THE NASA LARC 16-FOOT TRANSONIC DYNAMICS WIND TUNNEL
2364	160,527 V-01	OA145B	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL(OA145B)
2364	160,528 V-02	OA145B	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL(OA145B)
2364	160,529 V-03	OA145B	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL(OA145B)
2365	151,056	OS6	RESULTS OF FLUTTER TEST OS6 OBTAINED USING THE 0.14-SCALE WING/ELEVON MODEL (54-0) IN THE NASA LARC 16-FOOT TRANSONIC DYNAMICS WIND TUNNEL
2366	151,063	OH25B	HEAT TRANSFER PHASE CHANGE PAINT TESTS OF 0.0175-SCALE MODEL (NO. 56-0) OF THE ROCKWELL INTERNATIONAL SPACE SHUTTLE ORBITER IN THE AEDC TUNNEL B HYPERSONIC WIND TUNNEL
2367	151,773	OH57A/B	RESULTS OF A HIGH ANGLE-OF-ATTACK AERO HEATING PRESSURE TEST ON A 0.0175-SCALE MODEL (92-0) OF THE OV-102 CONFIGURATION SPACE SHUTTLE ORBITER IN THE AEDC VKF TUNNEL B (OH57A/B)
2368	151,058	OH51	RESULTS OF PHASE CHANGE HEAT TRANSFER TEST OH51 USING 0.006-SCALE SPACE SHUTTLE ORBITER MODELS 46-0 AND 90-0 AND PARTIAL WING 0.0175-SCALE MODEL 64-0 IN THE LARC 31-INCH CFHT

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2369	167,345	SA31F	AN AERODYNAMIC STATIC STABILITY WIND TUNNEL TEST OF A 0.00856 SCALE MODEL OF THE SPACE SHUTTLE 146 INCH DIAMETER SOLID ROCKET BOOSTER REENTRY CONFIGURATION (MSFC MODEL 487) IN THE NASA/MSFC HIGH REYNOLDS NUMBER WIND TUNNEL
2370	151,790 V-01	OA149B/C	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL
2370	151,791 V-02	OA149B/C	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL
2370	151,792 V-03	OA149B/C	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL
2371	151,408	OH78	RESULTS OF BASE HEATING TESTS ON A 0.04 SCALE SPACE SHUTTLE ORBITER BASE (MODEL 65-0) IN THE NASA/JSC THERMAL VACUUM CHAMBER A
2372	160,843	IH72	RESULTS OF HEAT TRANSFER TESTS OF A 0.0175-SCALE SPACE SHUTTLE INTEGRATED VEHICLE MODEL 60-0TS IN THE AEDC-VKF TUNNEL A (IH72)
2373	160,821	LA99	EFFECT OF TAILCONE CUT-OFF AND STING CONFIGURATION ON THE AERODYNAMIC CHARACTERISTICS OF A 0.030 SCALE REMOTELY CONTROLLED ELEVON, BODYFLAP AND RUDDER) MODEL 201-0 ALT ORBITER TESTED IN THE NASA/LARC 8-FOOT TPT (LA99)
2374	167,372	LA82/LA103	INVESTIGATIONS IN THE CALSPAN 8-FOOT TRANSONIC WIND TUNNEL TO DETERMINE STING-TARE EFFECTS ON A MODIFIED 0.0165-SCALE SPACE SHUTTLE ORBITER MODEL WITH A TAILCONE (LA82/LA103)
2375	160,530	OA237	RESULTS OF AIR DATA SYSTEM CALIBRATION TEST USING THE 0.10-SCALE SPACE SHUTTLE ORBITER VEHICLE 102 FOREBODY MODEL 99-0 IN THE NASA 40 X 80-FOOT SUBSONIC WIND TUNNEL (OA237)
2376	151,779 V-01	OA149A	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2376	151,780 V-02	OA149A	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL
2376	151,781 V-03	OA149A	RESULTS OF TEST USING A 0.030-SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL
2377	167,342 V-01	IA144	RESULTS OF TESTS OF THE 0.010 SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 11X11 FOOT TRANSONIC WIND TUNNEL, MODEL 72-0TS TEST IA44
2377	167,343 V-02	IA44	RESULTS OF TESTS OF THE 0.010 SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 11X11 FOOT TRANSONIC WIND TUNNEL, MODEL 72-0TS TEST IA44
2378	160,820	IA191	RESULTS OF AN INVESTIGATION OF STATIC AND DYNAMIC PRESSURE DISTRIBUTIONS ON EXTERNAL TANK PROTUBERANCES IN THE 11-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (IA191)
2379	UNPUB	LA106	** DOCUMENT WAS NOT PUBLISHED **
2380	151,801 V-01	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145A)
2380	151,802 V-02	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145A)
2380	151,803 V-03	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL ( OA145A)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2380	151,804 V-04	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145A)
2380	151,805 V-05	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145A)
2380	151,806 V-06	OA145A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145A)
2381	TASK CANCELLED	LA107	** DOCUMENT WAS NOT PUBLISHED **
2382	151,382	OH8/IA109	RESULTS OF EXPERIMENTAL TESTS IN THE NASA/MSFC IMPULSE BASE FLOW FACILITY ON A SPACE SHUTTLE .04 SCALE ORBITER (MODEL 25-0) TO DETERMINE SECOND STAGE ASCENT BASE HEATING RATES AND PRESSURE DISTRIBUTION
2383	UNPUB	LA39	** DOCUMENT WAS NOT PUBLISHED **
2384	151,412 V-01	IA148	RESULTS OF RCS JET PLUME INTERACTION TESTS USING A 0.0125-SCALE MODEL (70-0T) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL 'B' (IA148)
2384	151,413 V-02	IA148	RESULTS OF RCS JET PLUME INTERACTION TESTS USING A 0.0125-SCALE MODEL (70-0T) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE AEDC VKF TUNNEL 'B' IA148)
2385	151,366	OH15	RESULTS OF TESTS ON A 0.111-SCALE SPACE SHUTTLE VEHICLE SIMULATED ELEVON/WING GAP HEAT TRANSFER MODEL (53-0) IN THE AMES RESEARCH CENTER 3.5-FOOT HWT
2386	151,368	OH44	RESULTS OF TESTS ON A 0.111-SCALE SPACE SHUTTLE VEHICLE SIMULATED ELEVON/ELEVON GAP HEAT TRANSFER MODEL (53-0) IN THE AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2387	TASK CANCELLED	LA104	** DOCUMENT WAS NOT PUBLISHED **
2388	167,676	OH84A	RESULTS OF WIND TUNNEL TESTS OF THIN-SKIN THERMOCOUPLE MODELS 83-0 (0.04-SCALE) AND 60-0 (0.0175-SCALE) OF THE SPACE SHUTTLE ORBITER IN THE AEDC VKF HYPERSONIC WIND TUNNEL B (OH84A)
2389	160,810 V-01	OA145C	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145C)
2389	160,811 V-02	OA145C	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145C)
2389	160,812 V-03	OA145C	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER VEHICLE 102 AERO CHARACTERISTICS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL (39-0) IN THE AMES RESEARCH CENTER UNITARY WIND TUNNEL (OA145C)
2390	160,481	LA101	LOW SUPERSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.0015-SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4 FOOT UPWT (LEG 1) (LA101)
2391	167,346	IA244	RESULTS OF TESTS OF THE 0.10 SCALE SPACE SHUTTLE INTEGRATED VEHICLE IN THE LANGLEY RESEARCH CENTER B-FOOT TRANSONIC PRESSURE TUNNEL, MODEL 72-0TS TEST IA244
2392	151,389	OA250	GROUND PROXIMITY TESTS OF THE 0.03-SCALE MODEL (45-0) SPACE SHUTTLE ORBITER IN THE ROCKWELL INTERNATIONAL NAAL LOW SPEED WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2393	167,679 V-01	IH51A	RESULTS OF SSV INTERFERENCE HEATING TESTS ON A 0.04-SCALE THIN-SKIN THERMOCOUPLE MODEL (58-0T) UTILIZING A SIMULATED EXTERNAL TANK 8 ORBITER FOREBODY IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (IH51A)
2393	167,680 V-02	IH51A	RESULTS OF SSV INTERFERENCE HEATING TESTS ON A 0.04-SCALE THIN-SKIN THERMOCOUPLE MODEL (58-0T) UTILIZING A SIMULATED EXTERNAL TANK & ORBITER FOREBODY IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (IH51A)
2393	167,681 V-03	IH51A	RESULTS OF SSV INTERFERENCE HEATING TESTS ON A 0.04-SCALE THIN-SKIN THERMOCOUPLE MODEL (58-0T) UTILIZING A SIMULATED EXTERNAL TANK & ORBITER FOREBODY IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (IH51A)
2393	167,682 V-04	IH51A	RESULTS OF SSV INTERFERENCE HEATING TESTS ON A 0.04-SCALE THIN-SKIN THERMOCOUPLE MODEL (58-0T) UTILIZING A SIMULATED EXTERNAL TANK & ORBITER FOREBODY IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (IH51A)
2394	UNPUB	LA109	** DOCUMENT WAS NOT PUBLISHED **
2395	151,394	LA111	EFFECT OF SILTS POD ON THE TRANSONIC AERODYNAMIC CHARACTERISTICS OF A 0.015-SCALE SHUTTLE ORBITER MODEL (44-0) TESTED IN THE NASA/LARC 8-FOOT TPT
2396	151,393	LA110	EFFECT OF SILTS POD ON THE LOW SUPERSONIC AERODYNAMIC CHARACTERISTICS OF A 0.015-SCALE SHUTTLE ORBITER MODEL (44-0) TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 1)
2397	167,347	LA113	RESULTS OF WIND TUNNEL TESTS ON A 0.010 SCALE MODEL (72-0TS) ROCKWELL SPACE SHUTTLE VEHICLE IN THE LARC 8-FOOT TRANSONIC PRESSURE TUNNEL (LA113)
2398	160,850 V-01	IA105A	RESULTS OF TESTS USING A 0.03 SCALE MODEL (47-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16 FOOT TRANSONIC PROPULSION WIND TUNNEL (IA105A)
2398	160,851 V-02	IA105A	RESULTS OF TESTS USING A 0.03 SCALE MODEL (47-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16 FOOT TRANSONIC PROPULSION WIND TUNNEL (IA105A)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2398	160,852 V-03	IA105A	RESULTS OF TESTS USING A 0.03 SCALE MODEL (47-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16 FOOT TRANSONIC PROPULSION WIND TUNNEL (IA105A)
2399	151,388	IA114	EFFECT OF SILTS POD ON THE HIGH SUPERSONIC AERODYNAMIC CHARACTERISTICS OF A 0.015-SCALE SHUTTLE ORBITER MODEL (44-0) TESTED IN THE NASA/LARC 4-FOOT UPWT (LEG 2)
2400	160,518	OA234	RESULTS OF SSV ORBITER AIR DATA SYSTEM CALIBRATION TEST USING THE 0.10-SCALE ORBITER FOREBODY MODEL 99-0 IN THE NASA/LEWIS 10 X 10-FOOT SUPERSONIC WIND TUNNEL (OA234)
2401	151,395	IS1A/B/C/OS3	AERONOISE TEST RESULTS USING A 0.040-SCALE SPACE SHUTTLE VEHICLE CONFIGURATION 2A MODEL (11-OTS) IN THE AMES RESEARCH CENTER UNITARY PLAN WIND TUNNELS
2402	151,763	OA223	SYSTEM CHECKOUT OF THE 0.05-SCALE SPACE SHUTTLE VEHICLE ORBITER 102 MODEL (39-0) IN THE NAAL LOW SPEED WIND TUNNEL(OA223)
2403	160,515 V-01	IA156A	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA156A)
2403	160,516 V-02	IA156A	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA156A)
2403	160,517 V-03	IA156A	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA156A)
2404	160,510 V-01	IA119	RESULTS OF TESTS USING A 0.020-SCALE MODEL (88-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE JET PLUME IN THE NASA/ARC UPWT 11 X 11-FOOT LEG (TEST IA119)
2404	160,511 V-02	IA119	RESULTS OF TESTS USING A 0.020-SCALE MODEL (88-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE JET PLUME IN THE NASA/ARC UPWT 11 X 11-FOOT LEG (TEST IA119)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2404	160,512 V-03	IA119	RESULTS OF TESTS USING A 0.020-SCALE MODEL (88-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE JET PLUME IN THE NASA/ARC UPWT 11 X 11-FOOT LEG (TEST IA119)
2404	160,513 V-04	IA119	RESULTS OF TESTS USING A 0.020-SCALE MODEL (88-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE JET PLUME IN THE NASA/ARC UPWT 11 X 11-FOOT LEG (TEST IA119)
2405	151,756 V-01	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)
2405	151,757 V-02	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)
2405	151,758 V-08	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)
2405	151,759 V-04	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)
2405	151,760 V-05	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)
2405	151,761 V-06	OA101	RESULTS OF A LOW SPEED APPROACH AND LANDING EXPERIMENTAL INVESTIGATION OF A 0.050-SCALE SPACE SHUTTLE ORBITER MODEL (39-0) IN THE NASA/AMES RESEARCH CENTER'S 12-FOOT PRESSURE WIND TUNNEL (OA101)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2406	157,348	IA181	RESULTS OF AN EXPERIMENTAL INVESTIGATION IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL ON A 0.004-SCALE MODEL (74-OTS) SSLV TO DETERMINE INFLUENCE OF ORBITER AND SRB'S ON THE EXTERNAL TANK NOSE PRESSURE DISTRIBUTION (IA181)
2407	167,374	IH73	RESULTS OF M=5.3 HEAT TRANSFER TESTS ON THE SECOND STAGE SPACE SHUTTLE CONFIGURATION AT RTLS ABORT MISSION PROFILE CONDITIONS USING THE 0.006 SCALE MODEL 50-0 & 41-T IN THE NASA/ARC 3.5-FOOT HWT (IH73)
2408	160,498 V-01	IA156B	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 9X7 FOOT SUPERSONIC WIND TUNNEL (IA156B)
2408	160,499 V-02	IA156B	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 9X7 FOOT SUPERSONIC WIND TUNNEL (IA156B)
2408	160,500 V-03	IA156B	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 9X7 FOOT SUPERSONIC WIND TUNNEL (IA156B)
2409	160,842	IA115	ADDITIONAL TRANSONIC STABILITY AND CONTROL CHARACTERISTICS OF A 0.015 SCALE (REMOTELY CONTROLLED ELEVON) MODEL 44-0 SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 8-FOOT TPT (LA115)
2410	151,777	OH56	RESULTS OF THE NASA/RI ORBITER WING TIP HEATING TEST WITH THE 0.08-SCALE ORBITER WING MODEL (91-0) IN THE AEDC VKF B HYPERSONIC WIND TUNNEL (OH56)
2411	UNPUB	LA116	** DOCUMENT WAS NOT PUBLISHED **
2412	167,386 V-01	IH90	RESULTS OF HEAT TRANSFER TESTS ON THE SPACE SHUTTLE INTEGRATED VEHICLE, UNDER ASCENT CONDITIONS. USING THE 0.0175-SCALE 60-OTS MODEL IN THE NASA/ARC 3.5-FOOT HWT (IH-90)
2412	167,387 V-02	IH90	RESULTS OF HEAT TRANSFER TESTS ON THE SPACE SHUTTLE INTEGRATED VEHICLE, UNDER ASCENT CONDITIONS. USING THE 0.0175-SCALE 60-OTS MODEL IN THE NASA/ARC 3.5-FOOT HWT (IH-90)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2413	160,858 V-01	IA105A	RESULTS OF TESTS USING A 0.03 SCALE MODEL (47-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/ARC 9X7 FOOT SUPERSONIC WIND TUNNEL (IA105B)
2413	160,859 V-02	IA105B	RESULTS OF TESTS USING A 0.03 SCALE MODEL (47-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/ARC 9X7 FOOT SUPERSONIC WIND TUNNEL (IA105B)
2414	160,484 V-01	OA232	CALIBRATION TESTS OF THE SPACE SHUTTLE AIR DATA SYSTEM USING A V.10-SCALE ORBITER FOREBODY MODEL (99-0) IN THE AEDC 16T PROPULSION WIND TUNNEL (OA223)
2414	160,485 V-02	OA232	CALIBRATION TESTS OF THE SPACE SHUTTLE AIR DATA SYSTEM USING A 0.10-SCALE ORBITER FOREBODY MODEL (99-0) IN THE AEDC 16T PROPULSION WIND TUNNEL (OA232)
2415	151,784 V-01	OA208/209	RESULTS OF TESTS USING A 0.02-SCALE MODEL (105-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER VON KARMAN FACILITY SUPERSONIC TUNNEL A (OA209) AND HYPERSONIC TUNNEL B (OA208/209)
2415	151,785 V-02	OA208/209	RESULTS OF TESTS USING A 0.02-SCALE MODEL (105-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER VON KARMAN FACILITY SUPERSONIC TUNNEL A (OA209) AND HYPERSONIC TUNNEL B (OA208/209)
2416	160,824	IA603	RESULTS OF TESTS IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL ON A 0.004 SCALE MODEL (74-0TS) THRUST AUGMENTED SPACE SHUTTLE INTEGRATED VEHICLE (IA603)
2417	151,770	OH58	RESULTS OF AEROTHERMODYNAMIC HEAT TRANSFER TESTS ON A 0.03-SCALE MODEL (93-0) SIMULATING THE ELEVON/ELEVON GAP AND ELEVON/FUSELAGE INTERFACE REGIONS OF THE SS ORBITER IN THE ARC 3.5HWT.
2418	151,414	IH100	RESULTS OF TESTS OF A DEVELOPMENT FLIGHT INSTRUMENTATION GAS TEMPERATURE PROBE IN THE AMES RESEARCH CENTER 3.5 FT. HYPERSONIC WIND TUNNEL (IH100)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2419	151,762	OA270B/C	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER AERO-CHARACTERISTICS AND EXAMINE TRANSONIC BLOCKAGE AND SHOCK REFLECTION EFFECTS UTILIZING 0.02-SCALE HI-FIDELITY MODELS 104-0 AND 105-0 IN THE LANGLEY RESEARCH CENTER 16-FT. TRANSONIC WIND TUNNEL OA270B/C
2420	167,385	OH103A	RESULTS OF TESTS ON A 0.04-SCALE SPACE SHUTTLE ORBITER FOREBODY MODEL (83-0) IN THE AEDC VKF HYPERSONIC WIND TUNNEL B TO OBTAIN AERODYNAMIC HEATING DISTRIBUTION ON LOWER FUSELAGE AND RCS NOZZLE AREAS (OH103A)
2421	160,495 V-01	OA251B/C	CALIBRATION TESTS OF THE SPACE SHUTTLE ORBITER AIR DATA SYSTEM USING A 0.10-SCALE ORBITER FOREBODY MODEL (99.0) IN THE NASA AMES RESEARCH CENTER 9 X 7 AND 8 X 7-FOOT LEGS OF THE UNITARY PLAN WIND TUNNEL (OA251B AND C)
2421	160,496 V-02	OA251B/C	CALIBRATION TESTS OF THE SPACE SHUTTLE ORBITER AIR DATA SYSTEM USING A 0.10-SCALE ORBITER FOREBODY MODEL (99.0) IN THE NASA AMES RESEARCH CENTER 9 X 7 AND 8 X 7-FOOT LEGS OF THE UNITARY PLAN WIND TUNNEL (OA251B AND C)
2422	151,767	FH15	RESULTS OF THIN SKIN THERMOCOUPLE TESTS CONDUCTED IN THE AEDC VKF TUNNEL A TO DETERMINE HEAT TRANSFER RATES ON A 0.0275 SCALE SSV ET FOREBODY (FH15)
2423	151,768	FH16	RESULTS OF THIN SKIN THERMOCOUPLE TESTS CONDUCTED IN THE NASA/ARC 3.5 FT. HYPERSONIC WIND TUNNEL TO DETERMINE HEAT TRANSFER RATES ON A .0275 SCALE SSV ET FOREBODY (FH16)
2424	160,506 V-01	OA126A/B/C	RESULTS OF TESTS ON THE EFFECTS OF AEROELASTICITY OF THE SPACE SHUTTLE ORBITER VERTICAL TAIL USING A 0.03-SCALE MODEL (47-0) IN THE NASA AMES UNITARY WIND TUNNELS (OA126A/B)
2424	160,507 V-02	OA126A/B/C	RESULTS OF TESTS ON THE EFFECTS OF AEROELASTICITY OF THE SPACE SHUTTLE ORBITER VERTICAL TAIL USING A 0.03-SCALE MODEL (47-0) IN THE NASA AMES UNITARY WIND TUNNELS (OA126A/B)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2424	160,508 V-03	OA126A/B/C	RESULTS OF TESTS ON THE EFFECTS OF AEROELASTICITY OF THE SPACE SHUTTLE ORBITER VERTICAL TAIL USING A 0.03-SCALE MODEL (47-0) IN THE NASA AMES UNITARY WIND TUNNELS (OA126A/B/C)
2425	UNPUB	LA117	** DOCUMENT WAS NOT PUBLISHED **
2426	TP1186	LA124	A WIND TUNNEL STUDY OF THE APPLICABILITY OF FAR-FIELD SONIC-BOOM THEORY TO THE SPACE SHUTTLE ORBITER
2427	167,675	OH103B	RESULTS OF TESTS OF A 0.0175-SCALE THIN-SKIN THERMOCOUPLE WIND TUNNEL MODEL (60-0) OF THE SPACE SHUTTLE ORBITER TO DETERMINE EFFECTS OF SURFACE ROUGHNESS IN THE AEDC VKI HYPERSONIC WIND TUNNEL B (OH103B)
2428	160,523 V-01	IH11	WIND TUNNEL TESTS OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE 84-OTS IN THE NASA/LEWIS 10 X 10-FOOT SUPERSONIC WIND TUNNEL (IH11)
2428	160,524 V-02	IH11	WIND TUNNEL TESTS OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE 84-OTS IN THE NASA/LEWIS 10 X 10-FOOT SUPERSONIC WIND TUNNEL (IH11)
2428	160,525 V-03	IH11	WIND TUNNEL TESTS OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE 84-OTS IN THE NASA/LEWIS 10 X 10-FOOT SUPERSONIC WIND TUNNEL (IH11)
2428	160,526 V-04	IH11	WIND TUNNEL TESTS OF THE 0.035-SCALE INTEGRATED SPACE SHUTTLE VEHICLE 84-OTS IN THE NASA/LEWIS 10 X 10-FOOT SUPERSONIC WIND TUNNEL (IH11)
2429	167,353	IH51B	THIN SKIN HEAT TRANSFER TESTS OF A SIMULATED SPACE SHUTTLE 0.04 SCALE SOLID ROCKET BOOSTER/ET MODEL (58-Ts) IN THE NASA/ARC 3.5 FOOT HYPERSONIC WIND TUNNEL (IH51B)
2430	160,817 V-01	OA270A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER AERO-CHARACTERISTICS AND EXAMINE TRANSONIC BLOCKAGE AND SHOCK REFLECTION EFFECTS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL(39-0) IN THE LANGLEY RESEARCH CENTER 16-FT. TRANSONIC WIND TUNNEL OA270A

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2430	160,818 V-02	OA270A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER AERO-CHARACTERISTICS AND EXAMINE TRANSONIC BLOCKAGE AND SHOCK REFLECTION EFFECTS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL(39-0) IN THE LANGLEY RESEARCH CENTER 16-FT. TRANSONIC WIND TUNNEL OA270A
2430	160,819 V-03	OA270A	RESULTS OF AN INVESTIGATION TO VERIFY SHUTTLE ORBITER AERO-CHARACTERISTICS AND EXAMINE TRANSONIC BLOCKAGE AND SHOCK REFLECTION EFFECTS UTILIZING AN .05-SCALE HI-FIDELITY REMOTE CONTROL MODEL(39-0) IN THE LANGLEY RESEARCH CENTER 16-FT. TRANSONIC WIND TUNNEL OA270A
2431	151,793 V-01	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,794 V-02	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,795 V-03	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,796 V-04	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,797 V-05	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,798 V-06	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-0TS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2431	151,799 V-07	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-OTS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2431	151,800 V-08	IH85	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE INTEGRATED VEHICLE TEST USING A 0.0175-SCALE MODEL (60-OTS) CONDUCTED IN THE AEDC-VKF TUNNEL A (IH85)
2432	160,845	LA125	INVESTIGATION OF LONGITUDINAL AND LATERAL-DIRECTIONAL AERODYNAMIC CHARACTERISTICS FOR A 2 PERCENT (MODEL 105-0) SPACE SHUTTLE ORBITER (VEHICLE 102) IN THE LARC UPWT AT MACH NUMBERS FROM 2.5 TO 4.5 (LA125)
2433	151,764	OA171	RESULTS OF TESTS USING A 0.020-SCALE MODEL (105-0) OF THE SPACE SHUTTLE VEHICLE ORBITER IN THE NAVAL SURFACE WEAPONS CENTER HYPERVELOCITY TUNNEL 9 (OA171)
2434	151,782	OA129	RESULTS OF TESTS ON THE EFFECTS OF AEROELASTICITY OF THE SPACE SHUTTLE ORBITER VERTICAL TAIL USING A 0.03-SCALE MODEL (47-0) IN THE AEDC-16T PROPULSION WIND TUNNEL (OA129)
2435	151,415	IH39	BASE PRESSURE AND HEAT TRANSFER TESTS OF THE 0.0225-SCALE SPACE SHUTTLE PLUME SIMULATION MODEL (19-OTS) IN THE NASA-LEWIS RESEARCH CENTER 10X10-FOOT SUPERSONIC WIND TUNNEL (TEST IH39)
2436	TM-X72661 V-06	LA126	SPACE SHUTTLE ORBITER TRIMMED CENTER OF GRAVITY EXTENSION STUDY VOLUME VI--SYSTEM DESIGN STUDIES
2437	151,766	FA25	RESULTS OF TRANSONIC TESTS IN THE NASA/MSFC 14-INCH TRANSONIC WIND TUNNEL ON A 0.004 SCALE MODEL (74-OTS) SPACE SHUTTLE LAUNCH VEHICLE (FA25)
2438	160,855 V-01	IA138	RESULTS OF AN EXPERIMENTAL INVESTIGATION TO DETERMINE ORBITER AND SOLID ROCKET BOOSTER JET PLUME INDUCED EFFECTS UTILIZING A 0.01-SCALE INTEGRATED VEHICLE SPACE SHUTTLE MODEL (75-OTS) IN THE NASA/ARC 9X7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2438	160,856 V-02	IA138	RESULTS OF AN EXPERIMENTAL INVESTIGATION TO DETERMINE ORBITER AND SOLID ROCKET BOOSTER JET PLUME INDUCED EFFECTS UTILIZING A 0.01-SCALE INTEGRATED VEHICLE SPACE SHUTTLE MODEL (75-0TS) IN THE NASA/ARC 9X7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL
2438	160,857 V-03	IA138	RESULTS OF AN EXPERIMENTAL INVESTIGATION TO DETERMINE ORBITER AND SOLID ROCKET BOOSTER JET PLUME INDUCED EFFECTS UTILIZING A 0.01-SCALE INTEGRATED VEHICLE SPACE SHUTTLE MODEL (75-0TS) IN THE NASA/ARC 9X7 FOOT LEG OF THE UNITARY PLAN WIND TUNNEL
2439	167,673	IA182	RESULTS OF TESTS USING A 0.03-SCALE MODEL (47-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA182)
2440	151,765	IH83	BASE PRESSURE AND HEAT TRANSFER TESTS OF THE 0.0225-SCALE SPACE SHUTTLE PLUME SIMULATION MODEL (19-0TS) IN YAWED FLIGHT CONDITIONS IN THE NASA-LEWIS 10X10-FOOT SUPERSONIC WIND TUNNEL
2441	UNPUB	LA127	** DOCUMENT WAS NOT PUBLISHED **
2442	UNPUB	LA128	** DOCUMENT WAS NOT PUBLISHED **
2443	151,769	OH79	PRESSURE AND HEAT TRANSFER TESTS OF THE 0.040-SCALE SPACE SHUTTLE ORBITER BASE HEATING MODEL (65-0) IN THE JSC THERMAL VACUUM CHAMBER A.
2444	160,488 V-01	IA183	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA183)
2444	160,489 V-02	IA183	RESULTS OF TESTS USING A 0.02-SCALE MODEL (89-0TS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE AEDC 16-FOOT TRANSONIC PROPULSION WIND TUNNEL (IA183)
2445	167,652 V-01	OA146	RESULTS OF A WIND TUNNEL PRESSURE LOADS TEST OF THE 0.03-SCALE SPACE SHUTTLE ORBITER (MODEL 47-0) IN THE 8X7-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (OA146)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2445	167,653 V-02	OA146	RESULTS OF A WIND TUNNEL PRESSURE LOADS TEST OF THE 0.03-SCALE SPACE SHUTTLE ORBITER (MODEL 47-0) IN THE 8X7-FOOT LEG OF THE NASA/ARC UNITARY PLAN WIND TUNNEL (OA146)
2446	UNPUB	LA122	** DOCUMENT WAS NOT PUBLISHED **
2447	UNPUB	OS52	** DOCUMENT WAS NOT PUBLISHED **
2448	160,519 V-01	IH51C	SPACE SHUTTLE THIN SKIN HEAT TRANSFER TESTS OF SIMULATED LARGE SCALE PROTUBERANCES AND HALF SCALE TILE ON FLAT PLATE MODEL 58-0TS IN THE NASA AMES RESEARCH CENTER 3.5-FT HYPERSONIC WIND TUNNEL (IH51C)
2448	160,520 V-02	IH51C	SPACE SHUTTLE THIN SKIN HEAT TRANSFER TESTS OF SIMULATED LARGE SCALE PROTUBERANCES AND HALF SCALE TILE ON FLAT PLATE MODEL 58-0TS IN THE NASA AMES RESEARCH CENTER 3.5-FT HYPERSONIC WIND TUNNEL (IH51C)
2449	160,497	IA132	RESULTS OF SHUTTLE TRANSPORTATION SYSTEM ASCENT AIR DATA SYSTEM CALIBRATION TEST USING THE 0.07-SCALE EXTERNAL TANK FOREBODY MODEL (68-T) IN THE AEDC PWT 13 FOOT TRANSONIC WIND TUNNEL (IA132)
2450	151,774	OS4A/B/ OS12	EXPERIMENTAL RESULTS OF TESTS TO DETERMINE THE EFFECTS OF ORBITER THERMAL PROTECTION SUBSYSTEM (TPS) TILES ON PANEL FLUTTER CONDUCTED IN THE ARC 2X2 TWT.
2451	151,772	OH90A/MA29	RESULTS OF BOUNDARY LAYER TRANSITION TESTS OF THE 0.025-SCALE RIGHT-HAND WING AND TRUNCATED AFT FUSELAGE MODEL (94-0) IN THE AEDC HWTB.
2452	167,383	IH99	RESULTS OF HEAT TRANSFER TESTS ON THE SPACE SHUTTLE FORWARD SRB SECTION AT ASCENT CONDITIONS USING THE 0.10-SCALE MODEL 98-5 IN THE NASA/AMES 3.5-FOOT HWT (IH99)
2453	151,776	IH75	BASE PRESSURE AND HEAT TRANSFER TESTS OF THE 0.0225-SCALE SPACE SHUTTLE PLUME SIMULATION MODEL (19-0TS) IN THE NASA/CALSPAN LUDWIG TUBE WIND TUNNEL

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2454	TM-X72661	V-03 LA57	IMPACT OF RETROFITS FOR CENTER-OF-GRAVITY EXTENSION ON ORBITER THERMAL PROTECTION SYSTEM
2455	151,778	OH102A	RESULTS OF FLOW ANGULARITY TESTS ON A 0.0175-SCALE SPACE SHUTTLE ORBITER MODEL (56-0) ON THE AEDC VKF B HYPERSONIC WIND TUNNEL (OH102A )
2456	160,486	V-01 IA184	RESULTS OF TESTS USING A 0.03-SCALE MODEL (47-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 9X7 FOOT SUPERSONIC WIND TUNNEL (IA184)
2456	160,487	V-02 IA184	RESULTS OF TESTS USING A 0.03-SCALE MODEL (47-OTS) OF THE SPACE SHUTTLE INTEGRATED VEHICLE IN THE NASA/AMES RESEARCH CENTER 9X7 FOOT SUPERSONIC WIND TUNNEL (IA184)
2457	160,813	IA180	RESULTS OF SHUTTLE TRANSPORTATION SYSTEM ASCENT AIR DATA SYSTEM HIGH SUPERSONIC CALIBRATION TEST USING THE 0.07-SCALE EXTERNAL OXYGEN HYDROGEN TANK FOREBODY MODEL (68-T) IN THE UNITARY PLAN HIGH SPEED LEG OF THE LARC 4X4 WIND TUNNEL (IA180)
2458	167,668	OS36/37	SPACE SHUTTLE HRSI TILE TESTS OS36 AND OS37 IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT AND 9X7-FOOT WIND TUNNELS USING TEST FIXTURES 96-0 AND 81-0 (OS36/37)
2459	167,685	V-01 OA310A/B/C	RESULTS OF THE AFRSI DETAILED-ENVIRONMENT TEST OF THE 0.035-SCALE SSV PRESSURE LOADS MODEL 84-0 IN THE AMES 11 X 11 FT. TWT AND THE LEWIS 8 X 6 FT. AND 10 X 10 FT. SWT.
2459	167,686	V-02 OA310A/B/C	RESULTS OF THE AFRSI DETAILED-ENVIRONMENT TEST OF THE 0.035-SCALE SSV PRESSURE LOADS MODEL 84-0 IN THE AMES 11 X 11 FT. TWT AND THE LEWIS 8 X 6 FT. AND 10 X 10 FT. SWT.
2460	UNPUB	FA27	** DOCUMENT WAS NOT PUBLISHED **
2461	167,677	IH51D	SPACE SHUTTLE TESTS OF TURBULENT BOUNDARY LAYER HEATING EFFECTS ON HALF-SCALE TILE SIMULATION USING MODEL 58-0 IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (IH51D)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2462	167,370 V-01	IA131B/C	RESULTS OF SUPERSONIC ASCENT AIR DATA SYSTEM CALIBRATION TESTSIA131B/C USING THE 0.07-SCALE EXTERNAL TANK FOREBODY MODEL 68-T IN THE ARC 9X7 AND 8X7 LEGS OF THE AMES UNITARY PLAN WIND TUNNEL
2462	167,371 V-02	IA131B/C	RESULTS OF SUPERSONIC ASCENT AIR DATA SYSTEM CALIBRATION TESTSIA131B/C USING THE 0.07-SCALE EXTERNAL TANK FOREBODY MODEL 68-T IN THE ARC 9X7 AND 8X7 LEGS OF THE AMES UNITARY PLAN WIND TUNNEL
2463	167,672	0S41/0S42/ 0S45	SPACE SHUTTLE LRSI TPS TILE TESTS 0541,0542 AND 0545 IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT WIND TUNNEL USING MODEL 107-0 (0541,0542 AND 0545)
2464	160,828 V-01	OH84B	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102
2464	160,829 V-02	OH84B	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102
2464	160,830 V-03	OH84B	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102
2464	160,831 V-04	OH84B	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102
2464	160,832 V-05	OH105	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2464	160,833 V-06	IH102	RESULTS OF HEAT TRANSFER TEST IN THE ARNOLD ENGINEERING DEVELOPMENT CENTER-VON KARMAN FACILITY TUNNELS A AND B UTILIZING SPACE SHUTTLE ORBITER THIN SKIN THERMOCOUPLE MODELS 56-0, 60-0, AND 83-0 TESTS: OH84B, OH105, IH-102
2465	167,674	OS55/57	AERODYNAMIC VENTING CHARACTERISTICS TESTS OF FULL-SCALE SPACE SHUTTLE MODEL 81-0 HRSI TPS TILES UNDER A SIMULATED LAUNCH ENVIRONMENT IN THE NASA/ARC 9X7-FOOT WIND TUNNEL (OS55/57)
2466	167,663 V-01	OA257	RESULTS OF INVESTIGATIONS OF THE 0.010-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 72-0 IN THE NASA/LANGLEY RESEARCH CENTER 20-INCH MACH 6 TUNNEL (OA257)
2466	167,664 V-02	OA257	RESULTS OF INVESTIGATIONS OF THE 0.010-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 72-0 IN THE NASA/LANGLEY RESEARCH CENTER 20-INCH MACH 6 TUNNEL (OA257)
2467	160,834	IH103	RESULTS OF AEROTHERMODYNAMIC HEAT TRANSFER TESTS ON 0.0175-SCALE MODELS 60-0T AND 56-0/60T CONDUCTED IN THE NASA/AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL (IH103)
2468	167,352	OH105B/OH84C	RESULTS OF A HEAT TRANSFER TEST SERIES IN THE NASA/ARC 3.5 FOOT HYPERSONIC WIND TUNNEL UTILIZING SPACE SHUTTLE ORBITER THIN-SKIN THERMOCOUPLE MODELS 60-0 AND 83-0 (TESTS OH84C AND OH105B)
2469	167,367	OS302A	SPACE SHUTTLE AFRSI LARGE-SCALE DEVELOPMENT TEST USING MODEL 117-0 SPECIMENS AND MODEL 96-0 TEST FIXTURE IN THE AMES RESEARCH CENTER 11X11-FOOT TRANSONIC WIND TUNNEL (OS302A)
2470	167,658	OS31A	SPACE SHUTTLE LRSI THIN TILE TEST IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT UNITARY PLAN WIND TUNNEL USING TEST FIXTURE 96-0 (OS31A)
2471	160,514	LA132	RESULTS OF TESTS ON A .02 SCALE SPACE SHUTTLE LAUNCH VEHICLE MODEL (89-0TS) IN THE LARC 16-FT TRANSONIC WIND TUNNEL TO DETERMINE PRESSURE DISTRIBUTION ALONG THE EXTERNAL TANK LOX CABLE TRAY (LA132)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2472	160,494	OH400	RESULTS OF AN ORBITER SILTS POD HEAT TRANSFER AND FLOW FIELD TEST USING A 0.0175-SCALE SPACE SHUTTLE ORBITER(92-0) IN THE AEDC VKF HYPERSONIC WIND TUNNEL B (OH400)
2473	167,388 V-01	OA252	AERODYNAMIC LOADS TEST OF 0.66-SCALE SPACE SHUTTLE ORBITER TILE ARRAY MODEL (106-0) IN THE NASA/ARC 2-FOOT TRANSONIC WIND TUNNEL (OA252)
2473	167,389 V-02	OA252	AERODYNAMIC LOADS TEST OF 0.66-SCALE SPACE SHUTTLE ORBITER TILE ARRAY MODEL (106-0) IN THE NASA/ARC 2-FOOT TRANSONIC WIND TUNNEL (OA252)
2474	160,826	FA28	RESULTS OF TESTS ON A 0.004 SCALE SPACE SHUTTLE LAUNCH CONFIGURATION (MODEL 74-OTS) IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL (FA28)
2475	160,509	LA140	PRESSURE DISTRIBUTION AND INTEGRATED LOADS AT FOUR STATIONS ON THE SPACE SHUTTLE TANK LOX FEEDLINE (LA140)
2476	167,690 V-01	IA190A,B	RESULTS OF EXPERIMENTAL INVESTIGATIONS TO DETERMINE EXTERNAL TANK PROTUBERANCE LOADS USING A 0.03-SCALE MODEL OF THE SPACE SHUTTLE LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL.
2476	167,691 V-02	IA190A,B	RESULTS OF EXPERIMENTAL INVESTIGATIONS TO DETERMINE EXTERNAL TANK PROTUBERANCE LOADS USING A 0.03-SCALE MODEL OF THE SPACE SHUTTLE LAUNCH CONFIGURATION (MODEL 47-OTS) IN THE NASA/ARC UNITARY PLAN WIND TUNNEL.
2477	160,825	LA141A/B	RESULTS OF INVESTIGATIONS ON AN 0.004-SCALE 140C MODIFIED CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL (74-0) IN THE NASA/LANGLEY RESEARCH CENTER 20-INCH MACH 6 TUNNEL (LA141)
2478	160,503 V-01	LA131	HIGH SUPERSONIC RUDDER EFFECTIVENESS AND EFFECT OF SILTS POD ON A 0.20-SCALE (REMOTELY DRIVEN CONTROL SURFACE) MODEL 106-0 SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UNITARY PLAN WIND TUNNEL (LA131)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2478	160,504 V-02	LA131	HIGH SUPERSONIC RUDDER EFFECTIVENESS AND EFFECT OF SILTS POD ON A 0.20-SCALE (REMOTELY DRIVEN CONTROL SURFACE) MODEL 106-0 SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UNITARY PLAN WIND TUNNEL (LA131)
2478	160,505 V-03	LA131	HIGH SUPERSONIC RUDDER EFFECTIVENESS AND EFFECT OF SILTS POD ON A 0.20-SCALE (REMOTELY DRIVEN CONTROL SURFACE) MODEL 106-0 SPACE SHUTTLE ORBITER TESTED IN THE NASA/LARC 4-FOOT UNITARY PLAN WIND TUNNEL (LA131)
2479	UNPUB	IA600	** DOCUMENT WAS NOT PUBLISHED **
2480	167,657	IH104	RESULTS OF HEAT TRANSFER TESTS ON THE SPACE SHUTTLE SECOND STAGE ASCENT VEHICLE AT FREESTREAM MACH = 5.3 AND 7.3 IN THE NASA/ARC 3.5-FOOT HWT USING THE 0.0175-SCALE MODEL 60-0T(IH104)
2481	167,377	IA602	RESULTS OF TESTS IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL ON A 0.004-SCALE MODEL (74-0TS) THRUST AUGMENTED SPACE SHUTTLE INTEGRATED VEHICLE (IA602)
2482	160,814 V-01	OA400	RESULTS OF TESTS FOR FORCE, MOMENT, PRESSURE AND AEROELASTIC DATA USING THE 0.030 SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC 11 FOOT UNITARY PLAN WIND TUNNEL, (OA400)
2482	160,815 V-02	OA400	RESULTS OF TESTS FOR FORCE, MOMENT, PRESSURE AND AEROELASTIC DATA USING THE 0.030 SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC 11 FOOT UNITARY PLAN WIND TUNNEL, (OA400)
2482	160,816 V-03	OA400	RESULTS OF TESTS FOR FORCE, MOMENT, PRESSURE AND AEROELASTIC DATA USING THE 0.030 SCALE PRESSURE LOADS SPACE SHUTTLE ORBITER MODEL (47-0) IN THE NASA/ARC 11 FOOT UNITARY PLAN WIND TUNNEL, (OA400)
2483	167,357 V-01	OS49	RESULTS OF A TEST OF THE FULL-SCALE NASA ORBITER VERTICAL TAIL (MODEL 111-0) IN THE AEDC 16-FOOT PROPULSION WIND TUNNEL (OS-49)
2483	167,358 V-02	OS49	RESULTS OF A TEST OF THE FULL-SCALE NASA ORBITER VERTICAL TAIL (MODEL 111-0) IN THE AEDC 16 FOOT PROPULSION WIND TUNNEL (OS-49)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2484	UNPUB	LA144	<b>** DOCUMENT WAS NOT PUBLISHED **</b>
2485	167,361	OS50/OS50A	RESULTS OF VENT PORT TPS LOADS TESTS IN THE AMES RESEARCH CENTER (ARC) 11X11-FOOT WIND TUNNEL USING MODEL 113-0 (OS50/OS50A)
2486	167,368 V-01	OA253	RESULTS OF WIND TUNNEL TEST OA253 IN THE AEDC 16-T PROPULSION WIND TUNNEL USING A 0.035-SCALE SS LAUNCH VEHICLE MODEL 84-0TS & ENTRY VEHICLE MODEL 84-0
2486	167,369 V-02	OA253	RESULTS OF WIND TUNNEL TEST OA253 IN THE AEDC 16-T PROPULSION WIND TUNNEL USING A 0.035-SCALE SS LAUNCH VEHICLE MODEL 84-0TS & ENTRY VEHICLE MODEL 84-0
2487	167,362	OS43/OS51/ OS51B/OS51C	RESULTS OF AMES GAP FILLER TESTS USING TEST FIXTURE 96-0 IN THE NASA/AMES 11X11-FOOT TUNNEL (OS43/OS51/OS51B/OS51C)
2488	160,835	OS300	PRELIMINARY SCREENING TESTS OF THE SPACE SHUTTLE AFRSI MATERIAL USING MODEL 115-0 IN THE NASA/AMES RESEARCH CENTER 2X2 FOOT TRANSONIC WIND TUNNEL (OS300)
2489	167,366	OS56	RESULTS OF A WIND TUNNEL TEST ON THE SPACE SHUTTLE UMBILICAL PURGE CURTAIN IN THE AEDC 16-T PROPULSION WIND TUNNEL (PWT), USING MODEL 108-0 (OS56)
2490	167,349 V-01	OH109	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE 0.0175-SCALE ORBITER MODELS 56-0/60-0 AND 0.04-SCALE ORBITER FOREBODY MODEL 83-0 CONDUCTED IN THE AEDC/VKF-B 50-INCH HYPERSONIC WIND TUNNEL (TESTS OH109 & OH109B)
2490	167,350 V-02	OH109	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE 0.0175-SCALE ORBITER MODELS 56-0/60-0 AND 0.04-SCALE ORBITER FOREBODY MODEL 83-0 CONDUCTED IN THE AEDC/VKF-B 50-INCH HYPERSONIC WIND TUNNEL (TESTS OH109 & OH109B)



**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2490	167,351 V-03	OH109	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE 0.0175-SCALE ORBITER MODELS 56-0/60-0 AND 0.04-SCALE ORBITER FOREBODY MODEL 83-0 CONDUCTED IN THE AEDC/VKF-B 50-INCH HYPERSONIC WIND TUNNEL (TESTS OH109 & OH109B)
2491	167,659 V-01	OA258	RESULTS OF INVESTIGATIONS ON THE 0.020-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 106-0 IN THE USAF/AEDC VKF TUNNEL B (OA258)
2491	167,660 V-02	OA258	RESULTS OF INVESTIGATIONS ON THE 0.020-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 106-0 IN THE USAF/AEDC VKF TUNNEL B (OA258)
2491	167,661 V-03	OA258	RESULTS OF INVESTIGATIONS ON THE 0.020-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 106-0 IN THE USAF/AEDC VKF TUNNEL B (OA258)
2491	167,662 V-04	OA258	RESULTS OF INVESTIGATIONS ON THE 0.020-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 106-0 IN THE USAF/AEDC VKF TUNNEL B (OA258)
2492	167,359	OH107	RESULTS OF THE SSV ELEVON GAP HEATING TESTS USING THE 0.025-SCALE SPACE SHUTTLE ORBITER MODEL (94-0) IN THE AEDC/VKF HYPERSONIC WIND TUNNEL B (OH107)
2493	167,665 V-01	OA259	RESULTS OF INVESTIGATIONS OF THE 0.010-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 72-0 IN THE NASA/AEDC VKF TUNNEL B (OA259)
2493	167,666 V-02	OA259	RESULTS OF INVESTIGATIONS OF THE 0.010-SCALE OV-102 CONFIGURATION SPACE SHUTTLE VEHICLE ORBITER MODEL 72-0 IN THE NASA/AEDC VKF TUNNEL B
2494	167,360	OH108	AERODYNAMIC HEATING TESTS OF A 0.10-SCALE SS ORBITER ELEVON/ELEVON GAP MODEL 93-0 IN THE NASA/ARC 3.5 FOOT HYPERSONIC WIND TUNNEL (OH108)
2495	160,844	OH110	TEST RESULTS FROM THE NASA/ROCKWELL INTERNATIONAL SPACE SHUTTLE 0.0175-SCALE ORBITER MODELS 56-0/60-0 AND THE 0.04-SCALE ORBITER FOREBODY MODEL 83-0 CONDUCTED IN THE NASA/ARC 3.5-FOOT HYPERSONIC WIND TUNNEL (TEST OH110)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2496	167,380 V-01	OH111	RESULTS OF THE TRANSATLANTIC ABORT MANEUVER TEST(OH111) USING THE 0.0175-SCALE 56-0 AND 60-0. AND THE 0.04-SCALE 83-0 THIN SKIN THERMOCOUPLE MODELS IN THE AEDC VKF TUNNEL B HYPERSONIC WIND TUNNEL(OH111)
2496	167,381 V-02	OH111	RESULTS OF THE TRANSATLANTIC ABORT MANEUVER TEST(OH111) USING THE 0.0175-SCALE 56-0 AND 60-0. AND THE 0.04-SCALE 83 0 THIN SKIN THERMOCOUPLE MODELS IN THE AEDC VKF TUNNEL B HYPERSONIC WIND TUNNEL(OH111)
2496	167,382 V-03	OH111	RESULTS OF THE TRANSATLANTIC ABORT MANEUVER TEST(OH111) USING THE 0.0175-SCALE 56-0 AND 60-0. AND THE 0.04-SCALE 83-0 THIN SKIN THERMOCOUPLE MODELS IN THE AEDC VKF TUNNEL B HYPERSONIC WIND TUNNEL(OH111)
2497	UNPUB	MA34	** DOCUMENT WAS NOT PUBLISHED **
2498	167,656	OA255/OA256	RESULTS OF SPACE SHUTTLE ORBITER (MODEL 70-0) LATE ENTRY RCS YAW JET EFFECTS TESTS IN THE NASA/LARC UPWT AND 16-FT. WIND TUNNELS (OA255/OA256)
2499	160,836	OA164	RESULTS OF TESTS USING A 0.36-SCALE MODEL (76-0) OF THE SSV ORBITER 101 IN THE NASA/AMES RESEARCH CENTER 40X80-FOOT SUBSONIC WIND TUNNEL(OA164)
2500	160,848	OS301	PHASE 11 SCREENING TEST OF AFRSI MATERIAL USING MODEL 115-0 IN THE AMES RESEARCH CENTER 2X2-FOOT TRANSONIC WIND TUNNEL (OS301)
2501	167,373	OS304A	SPACE SHUTTLE AFRSI OMS PODS/JOINTS DEVELOPMENT TEST USING MODEL 116-0 SPECIMENS 8 MODEL 96-0 TEST FIXTURE IN THE AMES RESEARCH CENTER 11X11-FOOT TRANSONIC WIND TUNNEL (OS304A)
2502	167,378	OS304B	SPACE SHUTTLE AFRSI DMS PODS/JOINTS DEVELOPMENT TEST USING MODEL 116-0 SPECIMENS AND MODEL 81-0 TEST FIXTURE IN THE AMES RESEARCH CENTER 9X7-FOOT SUPERSONIC WIND TUNNEL (OS304B)
2503	167,363	OS53A,B	RESULTS OF COMBINED LOADS ORBITER TEST (CLOT) IN THE NASA/LARC 8-FOOT TPT USING THREE CONFIGURATION 20 TPS FLOW TEST PANELS (OS53A/B)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2504	167,379	OS302B	SPACE SHUTTLE AFRSI LARGE-SCALE DEVELOPMENT TEST USING MODEL 117-0 SPECIMENS AND MODEL 81-0 TEST FIXTURE IN THE AMES RESEARCH CENTER 9X7-FOOT SUPERSONIC WIND TUNNEL (OS302B)
2505	167,376	OS46A-G	RESULTS OF ASCENT AERODYNAMIC LOADING TESTS OF THE SS THERMAL PROTECTION SYSTEM (TPS) IN & AROUND THE ORBITER/ET UMBILICAL DOOR & CAVITY USING MODELS 108-0 & 1090 IN THE AEDC 16-T PROPULSION WIND TUNNEL (OS46A-G)
2506	167,384	OS60/1/2/3	GAP FILLER REUSE TESTS OF FULL-SCALE SPACE SHUTTLE ORBITER TILE ARRAY MODELS IN THE NASA/ARC 9X7-FOOT AND 11-FOOT UNITARY PLAN WIND TUNNEL (OS60 , OS61B, OS62, OS62A, AND OS63)
2507	167,683	MA33A/B	RESULTS OF INVESTIGATIONS OF THE SPACE SHUTTLE ORBITER ONE-QUARTER-HERTZ OSCILLATION ANOMALY IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT AND 9X7-FOOT WIND TUNNELS USING 0.02-SCALE MODEL 106-0 (MA33A/B)
2508	167,650	OS306A/B	SPACE SHUTTLE AFRSI DESIGN CRITERIA DEVELOPMENT TESTS IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT AND 9X7-FOOT WIND TUNNELS USING MODEL 23-0 (OS306A/B)
2509	167,654	OA307A/B	SPACE SHUTTLE FRSI-12 TPS TILE VENTING TEST IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT AND 9X7-FOOT WIND TUNNELS (OA37A/B)
2510	167,651	OS309A	SPACE SHUTTLE AFRSI FULL-SCALE CREDIBILITY TEST IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT WIND TUNNEL USING MODEL 124-0 INSTALLED IN THE 96-0 TEST FIXTURE (OS309A)
2511	167,669 V-01	IA300	RESULTS OF COLD PLUME TESTS OF THE 0.010-SCALE MODEL (75-0TS) IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT WIND TUNNEL (IA300)
2511	167,670 V-02	IA300	RESULTS OF COLD PLUME TESTS OF THE 0.010-SCALE MODEL (75-0TS) IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT WIND TUNNEL (IA300)

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2511	167,671 V-03	IA300	RESULTS OF COLD PLUME TESTS OF THE 0.010-SCALE MODEL (75-OTS) IN THE NASA/AMES RESEARCH CENTER 11X11-FOOT WIND TUNNEL (IA300)
2512	167,667	OA308	BOUNDARY LAYER TESTS OF THE SPACE SHUTTLE AFRSI MATERIAL IN THE NASA/AMES RESEARCH CENTER 2X2-FOOT TRANSONIC WIND TUNNEL (OA308)
2513	167,678	OS313	SPACE SHUTTLE AFRSI GAP FIX TEST OS313 IN THE AEDC/USAF 16T TRANSONIC PROPULSION WIND TUNNEL USING MODEL 129-0 INSTALLED IN THE MODEL 96-0 TEST FIXTURE
2514	167,687	FA301	RESULTS OF THE ORBITER WING AND ELEVON LOAD ALLEVIATION TEST IN THE NASA/MSFC 14-INCH TRISONIC WIND TUNNEL ON A 0.004-SCALE MODEL (74-OTS) SPACE SHUTTLE INTEGRATED VEHICLE.
2515	167,684	OS305-1/5	POST-TEST DATA REPORT FOR THE SPACE SHUTTLE FULL-SCALE AFRSI SEQUENCE OF ENVIRONMENTS TEST (OS305-1 TO 5) IN THE NASA/AMES RESEARCH CENTER 11X11 FOOT WIND TUNNEL
2516	167,688	OS311	SPACE SHUTTLE AFRSI FULL-SCALE APPLICATION DESIGN ISSUES TEST OS311 IN THE AMES RESEARCH CENTER (ARC) 11 X 11-FT. WIND TUNNEL USING MODEL 127-0 INSTALLED IN THE 96-0 TEST FIXTURE
2517	167,689	OS314A/B/C	SPACE SHUTTLE AFRSI OMS POD ENVIRONMENT TEST USING MODEL 81-0 TEST FIXTURE IN THE AMES RESEARCH CENTER 9 X 7-FOOT SUPERSONIC WIND TUNNEL
2518	UNPUB	IA301	** DOCUMENT WAS NOT PUBLISHED **
2519	167,692	OA309	RESULTS OF TESTS OF ADVANCED FLEXIBLE REUSABLE SURFACE INSULATION VORTEX AND FLOW ENVIRONMENTS IN THE NORTH AMERICAN AERODYNAMICS LABORATORY LOWSPEED WIND TUNNEL USING 0.0405-SCALE SPACE SHUTTLE ORBITER MODEL 16-0
2520	167,693	IH97A/B/C	RESULTS OF AEROHEATING DFI AND ET DESIGN-DATA TEST ON A 0.0175-SCALE MODEL 60-OTS CONDUCTED IN THE VON KARMAN GAS DYNAMICS FACILITY (VKF) 40-INCH SUPERSONIC AND THE 50-INCH HYPERSONIC WIND TUNNELS A & C

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONTINUED)**

DMS-DR REPORT NUMBER	NASA CR NUMBER	NASA SERIES NUMBER	SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE
2521	167,694	OS310	RESULTS OF THE AFRSI REWATERPROOFING SYSTEMS SCREENING TEST IN THE NASA/AMES RESEARCH CENTER (ARC) 2 X 2-FOOT TRANSONIC WIND TUNNEL
2522	UNPUB	OS315	** DOCUMENT WAS NOT PUBLISHED **
2523	UNPUB	LA301	** DOCUMENT WAS NOT PUBLISHED **
2524	167,695	IH-42	RESULTS OF A $M = 5.3$ HEAT TRANSFER TEST OF THE INTEGRATED VEHICLE USING PHASE-CHANGE PAINT TECHNIQUES ON THE 0.0175-SCALE MODEL 56-OTS IN THE NASA/AMES RESEARCH CENTER 3.5-FOOT HYPERSONIC WIND TUNNEL
2525	UNPUB	LA302	** DOCUMENT WAS NOT PUBLISHED **
2526	UNPUB	OA350	** DOCUMENT WAS NOT PUBLISHED **
2527	UNPUB	LA150	** DOCUMENT WAS NOT PUBLISHED **
2528	UNPUB	LA151	** DOCUMENT WAS NOT PUBLISHED **
2529	UNPUB	LA152	** DOCUMENT WAS NOT PUBLISHED **
2530	UNPUB	OA352	** DOCUMENT WAS NOT PUBLISHED **
2531	UNPUB	MA300	** DOCUMENT WAS NOT PUBLISHED **
2532	UNPUB	MA301	** DOCUMENT WAS NOT PUBLISHED **
2533	UNPUB	OA356	** DOCUMENT WAS NOT PUBLISHED **
2534	UNPUB	OA357	** DOCUMENT WAS NOT PUBLISHED **
2535	UNPUB	OA358	** DOCUMENT WAS NOT PUBLISHED **
2536	UNPUB	IA304	** DOCUMENT WAS NOT PUBLISHED **
2537	UNPUB	OA353A	** DOCUMENT WAS NOT PUBLISHED **
2538	UNPUB	OA353B	** DOCUMENT WAS NOT PUBLISHED **
2539	UNPUB	OA353C	** DOCUMENT WAS NOT PUBLISHED **
2540	UNPUB	LA306	** DOCUMENT WAS NOT PUBLISHED **

**TABLE 5. SPACE SHUTTLE WIND TUNNEL TEST PROGRAM  
DATA REPORT DOCUMENTATION FOR PHASE C/D  
(CONCLUDED)**

<b>DMS-DR REPORT NUMBER</b>	<b>NASA CR NUMBER</b>	<b>NASA SERIES NUMBER</b>	<b>SPACE SHUTTLE VEHICLE WIND TUNNEL TEST DATA REPORT TITLE</b>
2541	167,698	OA362	SPACE SHUTTLE ORBITER CREW HATCH JETTISON TEST USING A 0.0405-SCALE MODEL (16-0) IN THE TEXAS A&M LOW SPEED WIND TUNNEL
2542	UNPUB	LA305	** DOCUMENT WAS NOT PUBLISHED **
2543	UNPUB	IA302A,B	** DOCUMENT WAS NOT PUBLISHED **
2544	UNPUB	IA308A	** DOCUMENT WAS NOT PUBLISHED **
2545	UNPUB	IA308B	** DOCUMENT WAS NOT PUBLISHED **
2546	UNPUB	OA355	** DOCUMENT WAS NOT PUBLISHED **
2547	167,696 V-01	IA310	RESULTS OF THE SPACE SHUTTLE VEHICLE ASCENT AIR DATA SYSTEM PROBE CALIBRATION TEST USING A 0.07- SCALE EXTERNAL TANK FOREBODY MODEL (68T) IN THE AEDC 16-FOOT TRANSONIC WIND TUNNEL
2547	167,697 V-02	IA310	RESULTS OF THE SPACE SHUTTLE VEHICLE ASCENT AIR DATA SYSTEM PROBE CALIBRATION TEST USING A 0.07- SCALE EXTERNAL TANK FOREBODY MODEL (68T) IN THE AEDC 16-FOOT TRANSONIC WIND TUNNEL
2548	UNPUB	FA302	** DOCUMENT WAS NOT PUBLISHED **
2549	185,697 V-01	IA613A	RESULTS OF WIND TUNNEL TESTS OF AN ASRM CONFIGURED 0.03-SCALE SPACE SHUTTLE INTEGRATED VEHICLE MODEL (47-OTS) IN THE AEDC 16-FOOT TRANSONIC WIND TUNNEL
2549	185,697 V-02	IA613A	RESULTS OF WIND TUNNEL TESTS OF AN ASRM CONFIGURED 0.03-SCALE SPACE SHUTTLE INTEGRATED VEHICLE MODEL (47-OTS) IN THE AEDC 16-FOOT TRANSONIC WIND TUNNEL
2550	UNPUB	IA613B	** DOCUMENT WAS NOT PUBLISHED **

# REPORT DOCUMENTATION PAGE

Form Approved  
OMB No. 0704-0188

Public reporting burden for this collection of information is estimated to average 1 hour per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.

1. AGENCY USE ONLY (Leave Blank)		2. REPORT DATE Jan/95	3. REPORT TYPE AND DATES COVERED Technical Memorandum 1969 - 1994	
4. TITLE AND SUBTITLE Documentation and the Archiving of the Space Shuttle Wind Tunnel Test Data Base - Volume 1: Background and Description			5. FUNDING NUMBERS	
6. AUTHOR(S) Paul O. Romere; Steve Wesley Brown*				
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) Lyndon B. Johnson Space Center Navigation, Control, and Aeronautics Division Houston, Texas 77058			8. PERFORMING ORGANIZATION REPORT NUMBERS S-786	
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES) National Aeronautics and Space Administration Washington, DC 20546-0001			10. SPONSORING/MONITORING AGENCY REPORT NUMBER TM-104806	
11. SUPPLEMENTARY NOTES *Lockheed Engineering & Sciences Company Houston, Texas				
12a. DISTRIBUTION/AVAILABILITY STATEMENT Unclassified/Unlimited Available from the NASA Center for AeroSpace Information (CASI) 800 Elkridge Landing Road Linthicum Heights, MD 21090-2934 (301) 621-0390 Subject Category: 18			12b. DISTRIBUTION CODE	
13. ABSTRACT (Maximum 200 words) Development of the Space Shuttle necessitated an extensive wind tunnel test program, with the cooperation of all the major wind tunnels in the United States. The result was approximately 100,000 hours of Space Shuttle wind tunnel testing conducted for aerodynamics, heat transfer, and structural dynamics. The test results were converted into Chrysler DATAMAN computer program format to facilitate use by analysts, a very cost effective method of collecting the wind tunnel test results from many test facilities into one centralized location. This report provides final documentation of the Space Shuttle wind tunnel program. The two-volume set covers the evolution of Space Shuttle aerodynamic configurations and gives wind tunnel test data, titles of wind tunnel data reports, sample data sets, and instructions for accessing the digital data base.				
14. SUBJECT TERMS Space Shuttles, Wind Tunnel Tests, Aerodynamic Characteristics, Heat Transfer, Dynamic Structural Analysis, Aerothermodynamics			15. NUMBER OF PAGES 192	
			16. PRICE CODE	
17. SECURITY CLASSIFICATION OF REPORT Unclassified	18. SECURITY CLASSIFICATION OF THIS PAGE Unclassified	19. SECURITY CLASSIFICATION OF ABSTRACT Unclassified	20. LIMITATION OF ABSTRACT Unlimited	

